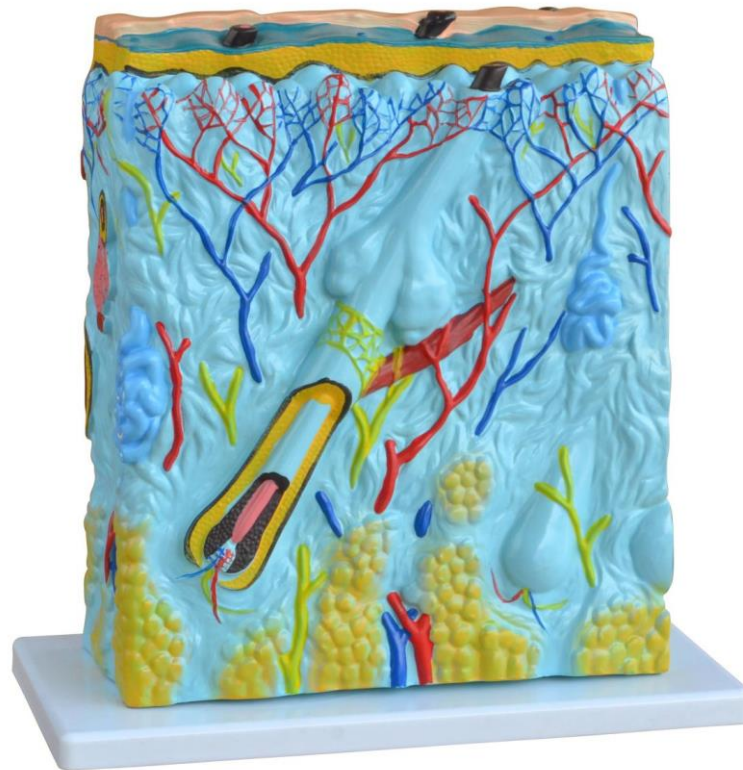


## PHYWE Skin model MOD-SKIN



### **USES:**

This model is used as a teaching tool for use in physiology and hygiene classes, showing the microscopic structure of the skin with its appendages, blood vessels and nerves.

### **DEMONSTRATIONS:**

The model shows the structural properties of the human skin as follows:

#### **1. Structure of the skin**

- a. Epidermis: Showing the cornified layer (stratum corneum), germinal layer (stratum germinativum) and pores of sweat gland.
- b. Dermis:
  - (1) The papillary layer which is the superficial portion of the dermis and projects into corresponding depressions on the deep surface of the epidermis to form a multitude of eminences known as dermal papillae. Some of the papillae contain blood vessels known as vascular papillae, while others including sensory nerve endings known as tactile papillae.
  - (2) The reticular layer which is the deep portion of the dermis and consists of coarse fibers, blood vessels, nerve fibers, lymphatics, excretory ducts of sweat gland, sebaceous glands and arrector pili muscles.
- c. Hypodermis: Showing the presence of adipose tissue, large blood vessels and nerve fibers.

#### **2. Appendages of the skin**

- a. The sweat glands - showing the coiled secretory portion and the simple straight tubular excretory duct which runs towards the surface of the skin.
- b. The sebaceous glands - lying between the hair follicle and arrector pili muscles. The orifice of the very short duct of the gland opens directly into the hair follicle.
- c. The hairs - showing the deeply located portion in the skin to be known as hair root. The deepest part the hair root swells to form the so-called hair bulb which is hollowed out at its base and filled with vascular connective tissue to form the hair papilla. The hair follicle is the tubular part of the hair root extending from the bulb to the surface of the skin. The hair follicle is formed from an external connective tissue sheath and an internal epithelial sheath. The exposed part of the hair on the skin is known as the hair shaft.

### **3. Blood vessels and nerves of the skin**

There is an abundant supply with blood vessels and nerves in the skin. The cutaneous vessels are supplied by branches from the deeper vessels and there breaking up into a network plexuses to the dermal papillae and sweat glands. Most nerve fibers of the skin are sensory in nature.

**DIMENSIONS:** 27 x 10 x 31 cm, 105 times enlarged

**CONSTRUCTION:** Made of PVC plastic. On base.