READING NOTES CHAPTER 6: INTEGUMENTARY SYSTEM (SKIN)

**Name \_\_\_\_\_\_\_\_\_\_\_\_**

**Period \_\_\_\_\_\_\_\_\_\_\_**

**Introduction (p. 180)**

Two or more types of tissues grouped together working together for a function are called an \_\_\_\_\_\_\_\_\_\_\_\_\_. Since the skin is composed of several types of tissues, it definitely qualifies as one. It is vital in maintaining \_\_\_\_\_\_\_\_\_\_\_\_\_. It isn’t enough to just say our skin **protects us**, for it does so in many ways:

1. It prevents many substances, including microorganisms, from

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

1. It retards \_\_\_\_\_\_\_\_\_\_\_ loss.
2. It regulates body \_\_\_\_\_\_\_\_\_\_\_\_\_.
3. It houses \_\_\_\_\_\_\_\_\_\_\_\_\_ receptors.
4. It contains \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ cells for initiating immune response.
5. It \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ small quantities of waste.
6. It produces small quantities of vitamin \_\_\_\_\_\_\_\_\_\_.

**Skin and its tissues**

There are many layers to the skin system. Each layer is specialized for different functions. **Be sure to read the blue inset boxes (ways to transmit medicines through the skin, bed sores, and psoriasis) on pages 181-183!**

**Epidermis –** for each layer found within,  **list its primary function (what are the keratinocytes doing in each layer) and other specialized cells found there.**

**Stratum basale (germanitivum)**

**Melanocytes**

**Merkel cells**

**Stratum spinosum**

**Langerhans cells (p. 180 introduction)**

**Desmosomes**

**Stratum granulosum**

**Stratum lucidum**

**Stratum corneum**

The epidermis ties to the underlying layer of the dermis by a **basement membrane**. Separations between these layers results in a **blister** forming, which is interstitial fluid that rushes in to stabilize the separation and promote healing.

**Dermis (page 185)** – There is an uneven ridgeline called dermal ­­\_\_\_\_\_\_\_\_\_\_\_\_ to increase the surface area for epidermal cells to receive oxygen and nutrients. These ridges are most abundant in our fingertips and toes, leaving a patterned impression called a \_\_\_\_\_\_\_\_\_\_\_\_\_\_. The dermis consists of two layers. For each layer, **list types of fibers** and the **function of each of the specialized cells found within:**

**Papillary layer:**

**Fibers:**

**Meissner’s (tactile) Corpuscles**

**Reticular layer:**

**Fibers:**

**Pacinian (lamellated) Corpuscles**

**Ruffini Corspuscles**

**Skin coloration (pages 184 -185) –** is determined by heredity but is a function of hemoglobin, carotene, and melanin amounts. For each of the disorders, **list the cause**:

**Albinism:**

**Tan skin:**

**Pink/red skin:**

**Cyanosis:**

**Paled skin:**

**Jaundice (see inset box on p. 185):**

**Skin cancer (inset box on p. 184):**

Indicators of skin cancer

**A:**

**B:**

**C:**

**D:**

**E:**

**Types of glands in skin (pages 188 – 190)** – for each gland, list what the primary function is along with its location/layer.

**Sebaceous:**

**Eccrine (sweat):**

**Apocrine:**

**Ceruminous:**

**Mammary:**

**Burn classification (pages 192 – 194) –** for each degree of burn, describe the level of tissues affected as well as level of severity for treatment.

**First-degree (superficial partial-thickness):**

**Second-degree (deep partial-thickness):**

**Third-degree (full-thickness):**