



## ***SMART PHARMACOLOGY***

### ***LESSON 1***

#### ***Task 1***

Complete the table. Define the terms “Pharmacology”, “Clinical Pharmacology” and “Pharmacotherapy”, name their subject of study and objectives. What are the differences between these sciences?

	<b>Pharmacology</b>	<b>Clinical pharmacology</b>	<b>Pharmacotherapy</b>
Definition			
Subject of study			
Objectives			

**Task 2**

Complete the following definitions for the terms “active ingredient”, “drug”, “dosage form”.

\_\_\_\_\_ is the physical form in which a drug is produced and dispensed; this form is rational and pharmacologically suitable for taking and storing and provides the optimum therapeutic effect with minimal side effects.

\_\_\_\_\_ is any component that provides the pharmacological activity or other direct effect in the diagnosis, cure, mitigation, treatment, or prevention of a disease, or affects the structure or any function of the body of man or animals.

\_\_\_\_\_ is an active ingredient and excipients in a finished dosage form.

**Task 3**

Divide the drugs listed below by pharmacological groups. What is the criterion for classifying drugs into one pharmacological group? Specify the pharmacological effects and indications. You can use the list of drugs attached

1. Codein.
2. Atropine sulfate.
3. Salbutamol.
4. Levothyroxine
5. Aspirin (Acetylsalicylic acid).
6. Cyanocobalamine.
7. Metotrexate.
8. Verapamil.
9. Glauzin.
10. Enap (Enalapril).
11. Lasix (Furosemide).

**Task 4**

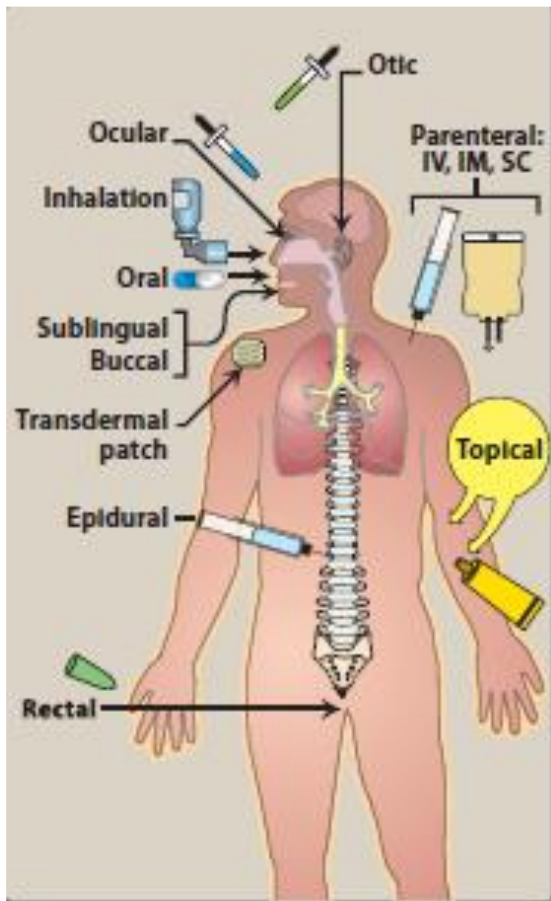
Give the definition to the main types of effects of drugs. Give examples.

1. Local effect - ...
2. Systemic (resorptive) effect - ...
3. Reflexive effect - ...
4. Direct effect - ...
5. Indirect effect - ...
6. Reversible effect - ...
7. Irreversible effect - ...

**Task 5**

Specify the following routes of administration? Match the numbers. Which drug formulations can be used for this (these) route(s) of administration?

1. Oral.
2. Inhalational.
3. Transdermal.
4. Vaginal.
5. Intravenous.
6. Sublingual.
7. Subcutaneous.
8. Rectal.
9. Intramuscular.
10. Epidural.



Specify the advantages/disadvantages of each route

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

---

**Case study**

*An 18-year old female patient is brought to the emergency department due to drug overdose. Which route of administration is the most desirable for administering the antidote for the drug overdose.*