Chapter 15 part 1

Schizophrenia
Schizophrenia

Description

Schizophrenia:

• A serious mental disorder characterized by disordered thoughts, delusions, hallucinations, and often bizarre behaviors.
Schizophrenia

- Description

- Positive symptom:
  - A symptom of schizophrenia evident by its presence: delusions, hallucinations, or thought disorders.

- Negative symptom:
  - A symptom of schizophrenia characterized by the absence of behaviors that are normally present: social withdrawal, lack of affect, and reduced motivation.
Schizophrenia

- Description

- Thought disorder:
  - Disorganized, irrational thinking.

- Delusion:
  - A belief that is clearly in contradiction to reality.

- Hallucination:
  - Perception of a nonexistent object or event.
Schizophrenia

Pharmacology of Schizophrenia

Chlorpromazine:
• A “typical neuroleptic”; a dopamine receptor blocker; a commonly prescribed antischizophrenic drug.

Clozapine:
• An “atypical neuroleptic”; an antipsychotic drug that blocks $D_4$ receptors in the nucleus accumbens.
Schizophrenia

Consequences of Long-Term Drug Treatment of Schizophrenia

Tardive dyskinesia:
• A movement disorder that can occur after prolonged treatment with antipsychotic medication, characterized by involuntary movements of the face and neck.

Supersensitivity:
• The increased sensitivity of neurotransmitter receptors; caused by damage to the afferent axons or long-term blockage of neurotransmitter release.
Schizophrenia

- Possible Causes of the Brain Abnormalities

- Epidemiology:
  - The study of the distribution and causes of diseases in populations.

  - Research suggest several environmental factors:
    Season of birth
    Viral epidemics
    Population density
    Latitude
    Prenatal malnutrition
    Rh incompatibility
    Maternal stress
Schizophrenia

Possible Causes of the Brain Abnormalities

Seasonal effect:
- The increased incidence of schizophrenia in people born during late winter and early spring.

Latitude effect:
- The increased incidence of schizophrenia in people born far from the equator.
Schizophrenia

Evidence for Abnormal Brain Development

Research evidence:

• Children who developed schizophrenia displayed more negative affect in their facial expression and were more likely to show abnormal movements.

• Children who developed schizophrenia also displayed poor social adjustment and did more poorly in school than their peers.