Learning Activity 4.1.

Psychotropic Medication Quiz

1. What is the mechanism of action by which antidepressant medications achieve the desired effect (regardless of the different physiological processes by which this action is accomplished)?

The mechanism is inhibiting the re-uptake of serotonin.

2. For what must the nurse be on the alert with the client who is receiving antidepressant medication?

   The nurse must be alert to any suicidal ideations or signs of serotonin syndrome.

3. As the nurse, when would you expect the client to begin showing signs of symptomatic relief after the initiation of antidepressant therapy?

   4 weeks is typically when symptomatic relief begins to be achieved.

4. Name an example of a tricyclic antidepressant_____ Amitriptyline _____.

   Name an example of an MAOI_____ Isocarboxazid _____.

   Name an example of an SSRI_____ Citalopram _____.

5. Describe some common side effects and nursing implications for tricyclic antidepressants.

   Some common side effects can be dry mouth, tachycardia, urine retention, blurred vision, etc

6. _____Hypertensive crisis_____ is the most potentially life-threatening adverse effect of MAOIs. Symptoms for which the nurse and client must be on the alert include:

   _____headache_____ _____chest pain_____. What must be done to prevent these symptoms from occurring? (Your answer must include some examples.)

Educate on the correct diet to avoid hypertension. Avoid foods like red meats, salty food, caffeine, etc.

7. Lithium carbonate is commonly prescribed for ___ mania in bipolar _____. Many times when these individuals are started on lithium therapy, the physician also orders an antipsychotic medication. Why might he or she do so? Anti-psychotics in collaboration can help reduce the mania significantly.

8. There is a narrow margin between the therapeutic and toxic serum levels of lithium carbonate. What is the therapeutic range? List the initial signs and symptoms of lithium toxicity.

   The therapeutic range for lithium carbonate is 0.4-1.0. Toxicity can show symptoms such as Hyperirritability, ecg changes, ataxia, etc.

9. Describe some nursing implications for the client on lithium therapy.

   Educate the patient to stay hydrated and have their levels monitored due to the narrow range

10. What is the mechanism of action for anxiolytics (with the exception of buspirone)?

These drugs can decrease the abnormal excitability in certain neurotransmitters such as GABA, serotonin, and dopamine.

11. What is the most commonly used group of anxiolytics? Give two examples.

    Benzodiazepines; Diazepam, Lorazepam

12. What are the most common side effects of anxiolytics?

    Dizziness, drowsiness, lethargy, etc

13. What must the client on long-term anxiolytic therapy be instructed in order to prevent a potentially life-threatening situation? The medications need to be tapered off.

14. What is thought to be the mechanism of action that produces the desired effect with antipsychotic medications? The thought mechanism is to reduce in dopamine in the brain and find a balance in the other chemicals.

15. Phenothiazines are an example of a "typical" antipsychotic group. Give two examples of phenothiazines and two examples of the newer "atypical" antipsychotics. Haloperidol, Thiothixene

    Risperidone, Olanzapine

16. Describe potential adverse hormonal effects associated with antipsychotic therapy.

    Gynecomastia, menstrual irregularities

17. Agranulocytosis is a potentially very serious side effect of antipsychotic therapy. The nurse and client should be on the alert for symptoms of _____cough _____, _____sore throat_____, and _____fever_____.

18. Neuroleptic malignant syndrome (NMS) is a rare but potentially fatal side effect of antipsychotic drugs. List symptoms for which the nurse must be on the alert when assessing for NMS.

    Dysrhythmias, diaphoresis, LOC changes, fever

19. Describe the symptoms of extrapyramidal side effects associated with antipsychotic therapy.

    Severe spasming of muscles such as the face, neck, tongue, etc.

20. What is the classification of medication that is commonly prescribed for drug-induced extrapyramidal reactions? Give two examples of these medications. Anticholinergics
    Atropine, benztropine

21. Describe a potentially life-threatening situation that could occur in the client who abruptly withdraws from long-term use of CNS stimulants. Suicidal ideation

Homework Assignment Questions and Answers

Please read the chapter and answer the following questions:

1. **Identify three priority safety concerns for each class of psychotropic medications.**

   Antianxiety Agents

   Severe withdrawal symptoms can occur if stopped abruptly, malformations can happen if taken during pregnancy, and rising quickly can cause a sudden blood pressure to drop so fall safety is top priority as well.

   Antipsychotics (novel)

   Priority concerns for these medications are sedation level, the possibility of the body not being able to reduce core temp, and compulsive behavior.

   Antipsychotics (phenothiazines and haloperidol)

   Priority concerns for phenothiazines are hypotension, prolongation of QT interval, and reduction of seizure threshold.
   Priority concerns for haloperidol are neuroleptic malignant syndrome, seizures in certain patients, and dizziness/drowsiness related to fall concern.

   MAO Inhibitors

   Priority concerns for MAOI's are potentially fatal interactions with other CNS medications, hypertensive crisis, and coma to death with concurrent use of opioids.

SSNRIs

Priority concerns for SNRI's are potentially fatal interactions with MAOI's, increased risk of toxicity with concurrent use, increased risk of suicidality in children and adolescents.

SSRIs

Priority concerns with SSRI's are increased risk of suicidality in children ad adolescents, serotonin syndrome, and potentially fatal interactions with MAOI's

Tricyclic antidepressants

Priority concerns with tricyclic medications are increased use of seizure with concurrent use, arrythmias, and hypertensive crisis.

2. Differentiate primary actions and side effects for traditional versus atypical antipsychotics.

Traditional meds block the postsynaptic dopamine receptors in many areas of the brain. Atypical meds have an antagonist effect on the receptors in the brain.
Side effects for atypical meds depend on the specific med but range from drowsiness, fatigue, dry mouth, weakness, blurred vision, hypotension, etc. Side effects for traditional meds are dry mouth, blurred vision, constipation, urinary retention, nausea, skin rash, sedation, orthostatic hypotension, photosensitivity, decreased libido, amenorrhea, retrograde ejaculation, gynecomastia, weight gain, reduction of seizure threshold, agranulocytosis, extrapyramidal symptoms, tardive dyskinesia, neuroleptic malignant syndrome, and prolongation of QT interval.

3. **Differentiate primary actions and side effects for tricyclic versus SSRI antidepressants.**

   Primary actions for tricyclic meds are inhibiting the reuptake of norepinephrine or serotonin at the presynaptic neuron. Primary actions for SSRi's are selectively inhibiting neuronal uptake of serotonin. Side effects for SSRI's are headache, insomnia, nausea, anorexia, diarrhea, constipation, sexual dysfunction, somnolence, dry mouth, increased risk of suicidality in children or adolescents. Side effects for tricyclic meds are drowsiness/fatigue, dry mouth, blurred vision, orthostatic hypotension, tachycardia, constipation, urinary retention, blood dyscrasias, nausea/vomiting, photosensitivity, possible QT prolongation, and increased risk of suicidality in children and adolescents.