Introduction to Critical Thinking case study: Healthcare Students

**Part 1**

Prescription drugs is a registered medication taken to cure, reduce or prevent the symptoms of a disease or condition. The drugs are usually produced by pharmaceutical companies. The prescription of a medicine by a health professional may be mandatory, optional or restricted depending on its composition or use (Avorn, 2008). A medicine is compulsorily dispensed by a pharmacist. They are often protected by a patent, at least at the beginning of their manufacturing and marketing cycle. Upon the expiry of his patent, the sale of copies, called generic, becomes authorized. Though, it would be potential to manage a wrong dosage medicine when there is a deficiency of knowledge or suitable process in chemists has not been followed therefore the medicines given by the physician.

According to the given scenario, the child’s physician suggested 100g of a particular prescription to be managed daily. Whereas, the nurses’ records 100mg of this drug had been managed every morning for the previous three days. This obviously indicates that the nurse did not follow the medicine given by the doctor henceforth lead to misunderstanding. The nurse managed the 100mg of all medicine at once. As said by drugs prescription, taking too much of a dose at once can result in organic infection, allergic reactions, and also lead to death due to brain damage and paralysis (McInerny et al., 2017). The prescription of medicines is a prescription act indicating the various drugs of the therapeutic plan proposed by the doctor or other health professional empowered, guided and consented by the patient, and engaging the responsibility of the person who writes it.

The prescription of medication is usually regulated by the health authorities of a country. Traditionally, prescription drugs are prescribed (Rosenthal, et.al. 2002). The pharmacist must inform the person that he / she needs to have his / her prescription renewed with his doctor. It also indicates on the ordinance the mention "delivery by the exceptional procedure of an additional box", and it affixes the stamp of the pharmacy and the date of issue.

Patient’s tolerance to drugs can vary based on their age and state of health. In most of the cases, such issues may emerge and some of the patients who overdose can recover very well. However, in some instances, death risks can occur. Different signs for overdosing include visual disturbance, diarrhea, dizziness, as well as seizures. Experiencing such symptoms should be addressed to the doctor as soon as possible. The long-term effects are very severe and can affect brain hemorrhages and also liver of the patients (McCabe, & Boyd, 2005).

Pediatric drugs are administered based on the body weight or surface. It is therefore important to ensure the dose has been calculated accordingly before administering it to the patient. When such cases happen, the patient’s breathing and condition should always be monitored. In addition, they should not be allowed to vomit. The 100mg can be given three times a day in quantities of 30mg. Moreover, diluting the medication can also be a way to solve this problem.

Part II

The solution I selected is “the 100mg can be given three times a day in quantities of 30mg” to avoid overdosing. This is because the prescribed drugs are calculated based on age and body weight in children (McInerny et al., 2017).

The weakness of this solution is that the development of tolerance and resistance are risk factors for addiction. Tolerance because it leads the individual to increase his consumption in order to obtain the desired effect, the resistance because it forces from the outset the individual to have a high consumption. The problem is that the continued use of these substances gradually replaces the natural capacity of neurotransmitters to produce a sensation of well-being, so that more and more doses are needed to achieve the same effect and feel good.

References

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