**Psychology Homework**

**Sleep Deprivation**

Submitted by:

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**Answer 1**

Typically, short-term sleep deprivation that lasts a few days is capable of having a wide range of effects on individuals. In fact, it can have varying effects on different aspects of mental and physical functioning(Medic, Wille, & Hemels, 2017). These impacts can also vary among individuals on the basis of different factors such as the specific activities or tasks considered during sleep deprivation, individual differences, and the duration of sleep loss. Based on these factors and differences, the impacts of sleep deprivation on people can vary to a great extent.

In the case of cognitive function, short-term sleep deprivation can often lead to decreased alertness and attention. It is possible for people to have a difficult in staying focused on different tasks and might face frequent disruptions in attention(Bobić, et al., 2016). In addition, it is also possible for working memory, short-term memory, and the ability to recall information to be impaired due to short-term sleep deprivation. In turn, it can often result in information retention and learning being adversely influenced significantly.

Meanwhile, when it comes to mood and emotions, even short-term sleep deprivation can result in mood disturbances like increased stress, anxiety, and irritability. It is also possible for mechanisms of emotional regulation to be compromised, which can often lead to heightened reactions(Short & Louca, 2015). In the case of physical health, it is possible for short-term sleep deprivation to influence metabolism. It can cause metabolism to function irregularly. In addition to it, it is also capable of affecting motor skills to some extent. For instance, it can impair reaction times and motor coordination similar to the impacts of alcohol intoxication.

It is worth noting that individual differences have a vital role to play in how different people are affected or influenced by sleep deprivation. For instance, the type of activity, the situation, and the duration of sleep deprivation are all some factors based on which people can experience different outcomes of sleep deprivation(Abrams, 2015). Perhaps the most critical factor is the duration of the deprivation as a longer duration can result in more severe outcomes for people. Meanwhile, when it happens for only a few days, its outcomes are not as severe.

**Answer 2**

The research article by Dotto (2000) discuss the impacts of sleep deprivation and the experiences of Lydia Dotto(Dytto, 2000). Lydia shares her experiences and struggles related to sleep deprivation. In the article, it is discussed that Dotto experienced a substantial decline in task performance, which is undoubtedly aligned with the existing research on common impacts of sleep deprivation. In addition to it, Dotto also felt dull and grumpy, which are again typical symptoms of sleep deprivation because it is capable of influencing emotional regulation to a significant extent. She discusses that, “*By 7 :00 A.M. on Wednesday, dull, d,'owsy, and defiant don't even come close to describing how I feel. Now approaching twenty-four hours without sleep, I am not in a happy frame of mind*” (Dytto, 2000, p.51)

Other than these effects, Dotto also experienced physical strain. For instance, it is identified in the article that she struggled with different tasks and even felt physically strained. For instance, she mentions that, “*Both Julia and I began to disintegrate during the early morning hours after the second night of sleep loss*”(Dytto, 2000, p.53). It is again an expected symptom because sleep deprivation is capable of impairing both alertness and motor skills. In addition, Dotto expressed that she felt her mood and performance improve after a nap. It tends to demonstrate how effective even a short period of sleep is for an individual.

There is no doubt that the experiences of Dottoin terms of sleep deprivation are typical of what short-term sleep deprivation can do to a person(Lim & Dinges, 2010). As it is discussed in the existing literature, short-term sleep deprivation is capable of causing shifts in the mood, the regulation of emotions, physical activities and motor skills, and even the cognitive performance. The same were mostly experienced by Dotto as she experienced sleep deprivation for a few hours. The positive outcomes of napping that she experienced are also consistent with the outcomes of napping as reported in the existing literature. For instance, napping is indeed capable of improving the mood and cognitive performance of an individual in the short run(Trivedi, Holger, Bui, Craddock, & Tartar, 2017).

**Answer 3**

Typically, napping refers to a short period of sleep, which is often taken during the day(Lovato & Lack, 2010). It is often performed in the afternoon and naps can often vary in length, ranging from only ten minutes of naps to two hours or more. On the basis of research, napping can have a positive influence on physical performance, alertness, and cognitive performance. It should be noted that the optimal length often varies based on the desired outcome and the individual. A short nap is capable of offering immediate improvements in cognitive performance, vigour, and even fatigue(E.Milner & Cote, 2009).

As far as the experience of Dotto is concerned, it is undoubtedly consistent with the existing literature and research studies on napping and its effect on individuals. For instance, after her nap, her performance increased significantly, which tends to demonstrate how even a short period of sleep can benefit performance. For instance, it is determined that “*The nap helped both of us tremendously. I woke up feeling completely refreshed and in a greatly improved frame of mind-feeling, in fact, pretty much as I had when the experiment began*” (Dotto, 2000, p.53).

In addition to it, it is mentioned in the article that Dotto experienced a significant improvement in her performance on tasks after a nap. For instance, it is determined that “*In fact, the nap had a significant impact on our performance of the tasks. Our scores on the logical reasoning and serial reaction time tasks improved by more than 40 percent after the nap, and in one case, Julia's score almost doubled*”(Dotto, 2000, p.53). It is consistent with the existing literature as it is indicated that napping can have a positive influence on the cognitive performance of individuals in the short run.

Napping can have a positive influence on the cognitive function through the improvement of alertness and performance, and memory consolidation, which is indicated by the experience of Dotto as well. In addition to it, in the case of mood and wellbeing, napping can improve mood and reduce stress. For instance, a short nap is capable of serving as a quick mental break. It can help a person feel less overwhelmed and more refreshed. As far as physical health is concerned, it is indicated by some research studies that regular napping might be related to cardiovascular benefits such as reduced blood pressure. Still, there is a need for more research in this aspect(Zhang, Xiao, Ma, & Li, 2020).

The impacts of napping can vary among individuals and people on the basis of individual differences and different factors such as nap timing and sleep during night time. It should be noted that the time of a nap is capable of affecting its effectiveness(Milner & Cote, 2009). For instance, a short nap that is taken in the afternoon can often result in better cognitive function and alertness. Meanwhile, longer naps are often identified to improve the creativity of an individual. On the other hand, when it comes to individual differences, it should be noted that people can vary in how they respond to naps. Not to mention, irregular and long napping during the day can also intervene with night time sleep.

It is possible for some people to experience enhanced performance and alertness as a result of a nap. On the other hand, it is possible that individuals might feel or experience sleep inertia or grogginess after taking a nap. It should be noted that these different experiences can vary on the basis of factors like individuals sleep quality and sleep needs. That is why it should be noted that the effects of napping are not uniform among individuals and can vary to a significant extent(Ancoli-Israel & Martin, 2006).

Overall, it can be said that the experiences of Dotto in terms of napping are consistent are with the findings of existing research studies on napping. Dotto experienced improved cognitive performance, a better mood, and even higher alertness. Existing research studies reveal similar findings and indicate that naps can have a positive influence on attention, cognitive performance, and mood. It is also critical to note that changes in the time duration of napping could have resulted in different outcomes for Dotto. It is mainly because research reveals that the outcomes of napping vary based on the time duration of napping.

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