1. PARALYSIS WHILE SLEEPING

In his book “Enchanted Sleep” Lavie (1993) describes incidents associated with sleep. Under the headline “Paralysis in Sleep” Lavie describes cases in which a person wakes up from sleep with a strong feeling of paralysis. This is a very unpleasant feeling.

Years before Lavie’s book was published, lectures were given by him and also by his assistant O. Tziscinsky. This is how I have learned about this phenomenon.

2. MOSQUITOES

Nobody likes mosquitoes. Yet when I complained to my friends about the many mosquitoes in their place the answer was always the same: That is correct, there are many mosquitoes here, yet lately no mosquitoes bothered me. Of course, the mosquitoes avoided them - all the mosquitoes came to me and left my friends alone. Mosquitoes sting, and do not let one sleep. Their buzzing wakes a person up. During the time I had to drive, it was difficult and dangerous because I didn’t get enough sleep. No advice helped. I could not sleep in an air-conditioned room, because I would catch a cold. No ointment or lotion deterred these mosquitoes. Apparently the mosquitoes in that place were very intelligent: If I used a buzzer to repel them, they immediately understood that this was a trick to confuse them, and that it was worthwhile to go to where the buzzer was, and enjoy a tasty meal - my blood. At home I used an anti-mosquito net between the window and the shutter. Yet no manager agreed to take the responsibility to allow me to put a net in the window. Why weren’t nets installed in the first place when the buildings were built?
For my next visit there, I decided to bring anti-mosquito nets. Despite the advantages the nets have some disadvantages. Sometimes a hole is created through which the mosquitoes pass and sting. It is possible to sew or tie the hole in the net. Sometimes during sleep my hand touches the net. The mosquitoes immediately take advantage of this and sting me through the small holes in the net.

Yet the main disadvantage that disturbed me was different. Whenever I woke up under the net, I suffered from paralysis. I was awake but paralyzed. I was not afraid, but it was certainly very unpleasant. I could think, and knew that this was the disturbance I previously heard about in lectures, but it did not make it more pleasant. I estimate that it took from half an hour to an hour until I regained sufficient strength to get up. Of course, I could not look at my watch and know the exact time that this sleep paralysis endured. The paralysis was accompanied by an unpleasant feeling of partial suffocation and pressure on my chest.

3. THE VENTILATOR TO THE RESCUE

I decided to give up the net. The paralysis disappeared, but the mosquitoes celebrated by feasting on my blood, finishing what they missed during the two nights when I slept under the net.

I thought about this. My guess was based on my feeling of partial suffocation. The room was closed without air circulation. I did not want to open the window and invite in millions of mosquitoes. The dozens that entered the closed room were already too much for me. I guessed that more CO$_2$ accumulated under the net, and insufficient oxygen reached my lungs. The solution I had in my mind was a ventilator.

I borrowed a ventilator for the night from one of the offices. I directed the ventilator on myself, went to sleep under the net, and fell asleep. Sometimes I heard a mosquito on the other side of the net trying to struggle with the airflow induced by the ventilator. The air gently flowed through the net exactly as I liked it. Every morning I returned the ventilator to the office.
I never woke up with paralysis again while the ventilator worked. As for me, my problem was solved.

4. DISADVANTAGES

This arrangement had some disadvantages. The ventilator made noise. The noise did not disturb my sleep, yet I thought that sleeping 40 nights each year with such noise could damage my hearing. However, the unpleasantness from the mosquitoes and the paralysis was more than I could bear. I already knew that my hearing was better. A few years later a hearing test found that my hearing was normal.

5. THE SECRETS OF SLEEP

I was surprised to see in December 1998, a program on the Israeli scientific channel 8, named The Secrets of Sleep that explained the paralysis I experienced. The narrator said that research found that paralysis was experienced by a fifth of the people interviewed. I accept this. Furthermore, the people who were paralyzed claimed that they always saw blurred images or a few images. The people who were investigated, their investigators and the editors of the television program claimed that the images were creatures from another star, and their influence caused the paralysis. As Lavie (1993) explained, during a dream, there is a blocking of actions in the spine that prevent the dreamers from walking, etc., that is, from being a lunatic. Sometimes a disturbance in the blocking happens which makes the dreamer a lunatic and sleepwalk. When the dreamer awakes, this blocking is supposed to be removed. However, there are situations where the blocking is not removed, which explains the paralysis in waking. I fully accept this explanation in Lavie’s book.

Lavie’s explanation did not include aliens from other stars. I also find this claim unacceptable.

From now on I suggest completing Lavie’s explanations as follows. The addition or decrease of the amount of oxygen upon awakening usually removes the sleep paralysis blocking. This is because breathing is different when sleeping versus when waking up.
I think that a small addition of oxygen by a simple ventilator is sufficient to prevent paralysis. It is possible that the noise of the ventilator had an influence on me, since I did not check whether a silent ventilator solves the problem. I also guess that most people have a better oxidation metabolic process than others, so that only one-fifth of people are subject to paralysis.

As for the explanation in the television program, that paralysis is caused by aliens from another star, I can only say that my special experience, as described above, necessitates more suggestions to this assumption:

a) Aliens of other stars are very interested in anti-mosquito nets.

b) Aliens of other stars are afraid of ventilators. This fear overcomes their attraction to anti-mosquito nets.

The thousands of documented cases of those who woke up paralyzed and claimed to have seen aliens from another star are not convincing as in my case, in which a simple experiment showed that this phenomenon is influenced by the supply of oxygen to the brain and body. In the thousands of documented cases, none of the investigations demonstrated the use of a ventilator to see what would happen. This is not thousands of cases against one, but one experiment against none. At this stage, my experiment suggests that the reason in the other cases is the same as in my experiment. The next step is obvious. In the thousands of cases where researchers will use a ventilator, they may prove the established reason as is usual in scientific investigations.

I will be very surprised if it will be found that in thousands of cases, the aliens of another star will be found to have caused the paralysis, although it results in very unnatural feelings.

6. MY RESEARCH SUGGESTION

I suggest measuring an additional parameter that was not yet considered as having any influence on other sleep disturbances: It should be investigated in order to see whether ventilation influences
each of the other sleep disturbances. Those disturbances that will be influenced by ventilation should be checked to see whether ventilation can be a simple solution to the problem, even if the problem is complicated, and/or its reason is unknown.

There is an invisible cloud around a sleeping person which is composed of a relatively high percentage of CO2, and a low percentage of oxygen. This decreases the amount of oxygen that a person breathes in and the amount of oxygen that reaches the brain. Circulating the air with a ventilator will decrease this effect very much so that more oxygen will reach the brain. If some disturbance appears only when there is no ventilation, and disappear, or decrease when there is ventilation, then it becomes obvious that ventilation influences these disturbances. So this is the simple solution to prevent paralysis while waking up.

7. ALIENS FROM OTHER STARS?

As for aliens from other stars that were seen by thousands of people, mostly when waking up, or while being in a car, I suggest another explanation: Lack of oxygen to the brain causes many disturbances, including paralysis and nervous breakdowns. One disturbance is hallucinations, which is dreaming while being awake. If the hallucination is not reasonable to the person waking up, he will then immediately understand that it is a dream. Yet if the hallucination is about encounters with aliens from outer space, he may think that it really happened. Why?

Registration in memory is an action in the brain. A normal person can easily identify whether a memory of an event is something that really happened to him, or it was just a dream. Part of the memory is the registration that identifies whether the memory is a dream or an event that really happened. Lack of oxygen may cause an error in this registration, so that when the person wakes up he will be sure that his dream really happened. He will testify to this with full confidence, and will pass any polygraph test. Another malfunction may be that the memory is not registered at all, or
registered without registering any links to retrieve this memory. Then the person loses time, as reported by many people.

I advise a person who hallucinated or lost time while driving to check the exhaust system for gas leaks. The gases of the exhaust contain CO2, CO, and other gases. Therefore, such gas leaks may prevent the brain from receiving its proper amount of oxygen. If one is dreaming when he is awakened, Ok, but if one dreams when he is awake, and then falls asleep, there is no doubt that the driver’s seat of a traveling car is the worst place to sleep. It is best to repair the gas leak in time.

It is best to open a window to let in the fresh air, so as not to fall asleep on the way to the garage.

Of course, you should go to the garage to check your exhaust system if you think that you have seen aliens while driving, or if you have lost time.

8. DISCUSSION

After this paper was written, I saw another TV program, Kidnapped by UFOs? [2]. (UFO stands for Unidentified Flying Objects). This TV program was balanced. It presented the views of Hopkins and Mack, who had written books (including references [9] - [13]) supporting the belief that aliens from other stars caused the paralysis in waking from sleep, and a feeling of being kidnapped. This is after they interviewed thousands of people. This TV program also presented the views of others opposing this belief and criticizing it, including Robert Baker, Donna Bassett, Paul Horowitz, Elizabeth Loftus, Richard Ofshe, Michael Persinger and Carl Sagan. One criticism was that all the thousands of people who testified that they had paralysis in waking from sleep because of aliens from another star that have a typical face, did it only after 1964, the year when a science fiction movie was broadcasted on TV. This movie showed fictitious aliens with a similar face. Earlier Satan and devils (incubus) were blamed for paralyzing people waking from sleep. One critic was Carl Sagan, who concluded:
"Whether what’s going on is in the outer space or the inner space, that is the question."

Philip Klass in his article (1966) and books (1968, 1974, 1986, 1989) explained many cases where UFOs were claimed, some of which were very complicated. His book (1989) referred to many claims of abduction by UFOs. Klass included in his book (1974) two cases where abductions by UFOs were claimed. In the first case, that was claimed to have occurred while driving a car, Klass’s investigation found (1974, pp. 251-252) that the letter describing the case did not mention abduction. However, the dreams about abduction appeared ten days after the date of the case, putting the case in doubt. In my opinion, this UFO case could be caused by a gas leak in the car during the long drive in the car, and the abduction dreams could be caused by the continued gas leak in the car.

Cheyne (2002) investigated situational factors affecting sleep paralysis and associated hallucinations. Citing Cheyne:

Sleep paralysis (SP) entails a period of paralysis upon waking or falling asleep and is often accompanied by terrifying hallucinations. Two conditions for sleep paralysis such as body position (supine, prone, and left or right lateral decubitus) and timing (beginning, middle, or end of sleep), were investigated in two studies involving 6730 subjects, including 4699 SP experiments.

I agree with all the critics. Furthermore, none of these distinguished researchers said a word about oxygen deficiency as a possible reason for either paralysis in waking from sleep or hallucinations about aliens from other stars while waking from sleep or driving a car. This paper is the first to suggest these ideas. In a way, my idea that oxygen deficiency can cause paralysis when waking up and hallucinations when driving a car completes the claims of the distinguished critics.
REFERENCES


   - Editions\(^1\): 1. Berkly, 2. Richard Marek Publishers


[14] The secrets of sleep, or The mysteries of sleep, A TV program.

\textsuperscript{1} A partial list of the editions in the first year(s) of publishing the book.