What is going on when a person experiences rapid eye movements during sleep?

It is fairly clear that the sleeping period must have some function, and because there is so much of it, the function would seem to be important.

Speculations about its nature have been going on for literally thousands of years, and one odd finding that makes the problem puzzling is that it looks very much as if sleeping is not simply a matter of giving the body a rest.

‘Rest’, in terms of muscle relaxation and so on, can be achieved by a brief period lying, or even sitting down.

The body’s tissues are self-repairing and self-restoring to a degree, and function best when more or less continuously active.

In fact, a basic amount of movement occurs during sleep, which is specifically concerned with preventing muscle inactivity.

If it is not a question of resting the body, then perhaps it is the brain that needs resting?

This might be a plausible hypothesis were it not for two factors.

First, the electroencephalograph (which is simply a device for recording the electrical activity of the brain by attaching electrodes to the scalp) shows that while there is a change in the pattern of activity during sleep, there is no evidence that the total amount of activity is any less.

The second factor is more interesting and more fundamental.

Some years ago, an American psychiatrist named William Dement published experiments dealing with the recording of eye movements during sleep.

He showed that the average individual’s sleep cycle is punctuated with peculiar bursts of eye-movements, some drifting and slow, others jerky and rapid.

People who woke up during these periods of eye movements generally reported that they had been dreaming.

When woken at other times, they reported no dreams.

If one group of people were disturbed from their eye-movement sleep for several nights on end, and another group was disturbed for an equal period, but when they were not exhibiting eye movements, the first group began to show some personality disorders while the others seemed more or less unaffected.

The implications of all this were that it was not the disturbance of sleep that mattered, but the disturbance of dreaming.

The author disproves the idea that we sleep in order to rest our muscles because the body’s tissues repair and restore themselves to a degree and they function best when active.

Eye movements during sleep indicate that a person is dreaming.

The brain performs a very important function: it controls the nervous system of the body.

The minister’s remarks have led to all kinds of wild speculations about the possibility of tax cuts.

The book was written specifically for young teenagers.

While this might seem a plausible hypothesis, no one thinks that it will work in practice.

There was not enough evidence for the court to convict the man of murder.

There is a fundamental difference between the policies of the two parties.

The silence of the forest was punctuated by occasional bursts of gunfire.

I didn’t recognize the animal at all, but it was black and white, and its behavior was characterized by jerky and rapid movements.

The most recent report on the nuclear accident ten years ago has finally concentrated on the wider implications of the incident for the environment.

Since we all sleep a great deal, it is fairly clear that sleep must have a function, and this is a problem which has puzzled mankind for thousands of years.

We are fairly sure now that the purpose of sleep is not to give the body a rest since we do not have to sleep in order to relax our muscles.

This can be done at any time simply by lying or sitting down for short periods.

And anyway, body tissues function best when our muscles are active.

During sleep itself, the body moves simply in order to prevent muscle inactivity, which would, as we know, result in numbness and cramping.

About a month ago, I had a dream that I can still remember very vividly.

I don’t often remember dreams, but this is one that made a deep impression on me.

In the dream, I was running along the top of a very high cliff with the beach and sea hundreds of feet below me.

As I ran, I kept turning around to see whether I was still being followed, and I was.

In fact, I was being chased by lots of man-sized dolphins on my legs!

I know it sounds mad and a little like a cartoon.

The dolphins didn’t catch me, and I just kept running, but I never got to the end of the dream because I woke up thrashing about in bed and sweating.

Since I had the dream, I’ve been wondering what it meant.

I know that people who interpret dreams say that they are rarely obvious, that all the images are mixed up, and that nothing is what it seems.

But this dream seemed to reflect the holiday I had just had and the fact that I had to go back to work soon.

On my holiday,y I had seen some dolphins — and I did not want to go back to work.

I think the dream reflected my worry, but of course, the dream could have meant something completely different.

He has been going to work regularly since he recovered from his illness.

They have been working overtime for several months.

The election results have been coming in steadily since midnight.

She’s been working on her novel since the beginning of the year.

Your car needs cleaning.

Your car needs to be cleaned.

Do these shoes need mending?

Do these shoes need to be mended?

The house wants decorating, I think.

The house wants to be decorated, I think.

If it were possible, I would leave tomorrow.

I would take action at once if it were not too late.

If this allegation were true, he would be arrested.

William Dement published experiments dealing with the recording of eye movements.

We have been dealing with the same firm for a number of years.

He's an extremely difficult child. His father is the only person who knows how to deal with him.

It wasn’t an accident. That window was broken on purpose.

On the whole, business has been very good this year.

The doctor’s very tired. He’s been on duty for fourteen hours.

How many soldiers are on leave?

You mustn’t open the door on any account when I’m out.

It’s getting late. I must be on my way.

The water is fairly warm.

The water is warm enough to swim in.

The children showed a puzzling lack of curiosity about where their parents were.

The instructions are so confusing that I can’t work out what they’re saying.

The rise in crime is mainly due to social and economic factors.

It is a fact that most deaths from lung cancer are caused by smoking.

Giving the body a rest doesn't seem to be the main function of sleep.

Electrical activity doesn't seem to diminish during sleep.

Rapid eye movements are an indication that a sleeper is dreaming.

The most important function of sleep is dreaming.

The body’s tissues can repair themselves.

Peculiar bursts of eye movements punctuate an individual's sleep.

People woken during these periods of eye movements generally reported that they had been dreaming during sleep.

Speculations have been going on for thousands of years, in fact.

This might be a plausible theory.

The second factor is more interesting and more basic.

Some eye movements were slow, others sudden and irregular.