■We should reduce artificial lighting around the world to help insects. Discuss.

I don’t think so.

It is too simplistic to conclude from this paper only that all artificial lightings are harmful to insects.

Because lighting effects to insects would depend on its wavelength and amount of light, it may be possible to reduce effect by changing them.

In addition, if we change the lighting to only illuminate roads, we can protect insects without reducing artificial lighting.

The reducing lighting is not the only way to do it.

Discussion

1. What do you think about what you read?

The researchers in this article conducted a survey by field tests.

The results are some kinds of truth, but field tests are affected by many disturbances.

So that I'm wondering if similar results can be obtained in lab experiments.

1. What role moths play in nature?

Moths play an important role in helping pollinate flowers like butterflies.

They help pollinate by carrying pollen from flower to other flowers.

1. How do caterpillars transform into moths and butterflies?

They have four developmental stages in their life.

They are egg, larva, pupa and imago.

Caterpillars which are categorized to larva undergoes metamorphosis into a pupa.

The pupa is a quiescent, non-feeding developmental stage.

In this stage, the insect’s physiology changes drastically for preparing next stage.

After that, emergence is occurred and they become imago.

These processes are called holometabolism.

1. What would it be like to be an insect researcher?

I imagine insect researchers have loved insects since their childhood because insects are more familiar since childhood than other filed of study such as physics.

I think it is fortunate to make their living on what they love although sometimes it is painful.

I imagine they may be worried about the gap between ideal and real because of their enthusiasm.

1. What three adjectives best describe this story?
2. Can you sleep if there is artificial light?

Yes, I can.

I usually sleep without light in the night, but I often sleep after dinner in the living room with artificial light.

Artificial light doesn’t matter when I am sleepy.

1. Should we have street lights and other artificial light?

I think so, because they are necessary to keep our safe at night.

Of course, insects are also necessary for natural world.

So, we should find a way for them to coexist.

1. What questions would you like to ask the researchers?