

## An easy experiment for dark matter

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**Abstract:** Physicists have computed that this universe was born nearly 13.7 millions years ago. It is generally believed that singularity / big bang caused the origin of this universe. After big bang, the forces were formed and matter came to existence. There are three different forms of matter: i) solid, ii) liquid and iii) gas. According to Einstein's special relativity, matter and energy are equivalent. Whenever energy is transformed into mass, shape and volume it is called matter. Matter is made up of tiny particles like electrons, protons and neutrons. Matter, antimatter and dark matter are the three kinds of matter. Antimatter is also made up of particles such as electrons, protons and neutrons but having negative sign. Perseverance of antimatter is experimentally existent but very expensive. The nature and the properties of dark matter is still a burning issue in physics. There are many conjectures, hypotheses and so called theories for dark matter. But it is mathematically manifested. Several experiments have been performed to deduct dark matter. Unfortunately no experiment is able to establish the existence of dark matter. All those attempted tests are very difficult to carry out and grasp. On the other hand, in this brief work the authors propose an easy laboratory test for the detection of dark matter. [Nature and Science 2009;7(12):31-32]. (ISSN: 1545-0740).

**Key words:** Big bang, matter, antimatter, dark matter and experimental establishments.

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### Introduction

Physical theories demonstrated beyond any doubt about the properties of matter. Regarding antimatter, many concrete results have been found. The existence of dark matter is proved only by mathematical equations but it lacks experimental verification. In physics, experiment is the supreme judge. So far only proposals have been proposed. And they are not scientific but philosophical. Physicists generally only believe that dark matter is made up of dark particles and dark energy. Their blind belief is that dark matter came into existence along with matter. They have a calculation that from 30% to 95% of this universe is constituted by dark matter. This dark matter is generally believed that it does not emit light and never interacts with electro magnetic force. In the following lab test the authors attempt to appraise the dark matter.

### Experiment

Choose a convenient dark room whose roof is made up of tiles. Make an artificial hole by slightly rearranging a tile. If this dark room is facing north,

the convenient time for doing this experiment is between 8.00 am to 9.00 am or 4.00 pm to 5.00 pm. during sun light. This test mainly depends on climatic conditions. Particularly the sun should be visible and bright to the naked eye. Choose an ideal time and lock the doors and windows of the above mentioned room. While the sun's light rays moves from top to bottom in the dark room, along the light path countless number of very tiny particles can be easily seen. For this viewing, no sophisticated equipments/apparatus are required. What are the physical phenomena of this result?

### Discussion

Several difficult and costliest experiments have been proposed in the past by top experimentalists, astro physicists, astronomers and organizations [1-35]. But these tests never produced positive results. These experiments did not directly detect or denote dark matter. Only they have hypothesised and guessed. In our experiment, the pin pointed tiny particles might be **clusters of dark matter** [9 & 24]. If these particles are not clusters of

dark matter, it must be either superstrings or gravitons. Let us note that superstrings or gravitons dominate the whole of quantum gravity. And till this date, there is no experimental evidence in support of both superstrings or gravitons. The authors politely believe that the experimentally invented particle can not belong to a third category.

### Conclusion

The visible of particle in the path traveled by the sun light in the dark room is very bright for the naked eyes. These particles may be dark matter or dust particles. Future studies will decide this.

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