

COLLECTION OF PHOTONS

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Abstract- It was pointed out that the current model of photon is completely wrong. An extensive set of matter images of the Sun and laser lights taken with an optical microscope since the February of 2014 are presented to confirm that the photon is a matter collectable. Light matter is able to be easily collected by exposing a substrate such as the plastic, glass or wafer to the light of the Sun or laser for a few, a few tens of minutes or a few hours. Various constructions formed by light matter are able to be observed by as they are obtained within one drop of water on the substrate. The presenting images demand replacement of the theoretical intangible photon with the tangible light matter.

Keywords - The Sun; Laser; Photons; Gel; Matter; Optical Microscope; Positive Energy; Image

I. INTRODUCTION

A photon has been long defined as an elementary particle possessing no mass and charges, but carrying an electromagnetic force. A number of experimental evidences contradictory to this theoretical photon model were reported. The images of the photons [1-3] collected from the Sun revealed that the photon is a tangible matter, therefore has a mass. Moreover, it possesses a positive energy as supported by a number of evidences including the energy distributions of the light matter comprising the Sun [2-3], formation of large light matter [2-3], and the structure of energy delivery to the surface plasmon carriers [3]. This is further supported from the energy distributions of matter composing laser light [4], identical to those of the Sun's matter. Moreover, light matter was found to be composed of solid and gel types of matter. A gel containing the solid photons was once called the "photon gel" [5]. Several photon gels of the Sun were reported [2-3, 6] as well as that of the laser light [7]. Move of light matter including the photon gels have been reported [2-3, 8]. All these evidences confirm that light is composed of tangible matter with mass and positive energy. Therefore, the intangible photon must be replaced by tangible light matter.

This work presents a number of images of light matter provided from the Sun and laser. These experimental images are surely enough to realize that the entity of the photon is a tangible matter.

II. EXPERIMENTAL OBSERVATIONS

Fig. 1 shows a photon gel containing solid and gel types of light matter. The photon gel was once defined as the gel matter containing solid photons. Various photon gels were reported [1-3, 6-7]. The light matter of Fig. 1 was collected by exposing a plastic substrate to the Sun. The image was taken with a microscope with a magnification rate of 500. A large conglomerate of solid light matter is included in the transparent gel matter. As marked by the two red arrows, the thin gel matter has certain thickness. Both solid and gel matter are in the plasma state as they escape the Sun.

According to the proposed model [8], light matter are equal to the pieces of electron orbits separated from the atom as their absorbed energies exceed the respective critical energy, limited by the amount of electrons packed in the orbits. The energy distributions enabled separating the solid and gel matter to different matter comprised of positrons and electrons, respectively [3]. The positrons of light matter then closely match those observed in the laser-applied experiments [9-11]. This indicates that the positrons are not created because they are just the constituents of light matter. This signifies that there is no need for converting light into matter as the ongoing work [13]. The matter property of light was definitely verified by the chemical elements identified in the work [3].

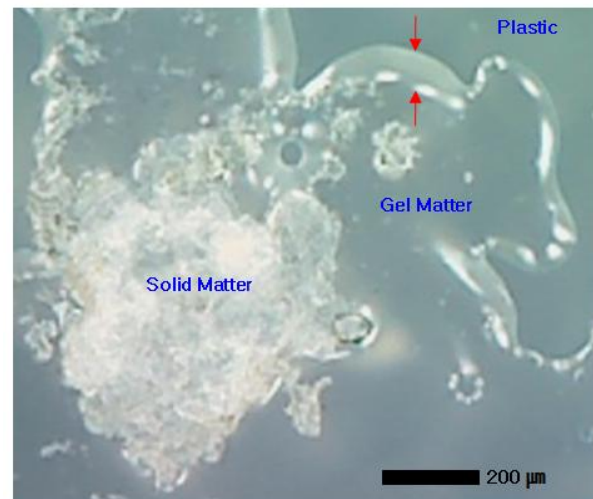


Fig. 1 A photon gel on a plastic substrate

Fig. 2(a) shows light matter collected on a wafer. The scale bar represents the same 200 μm as the one shown in Fig. 1. This is equally applied to others appearing in other figures through the text. Two photon gels, similar to the earlier ones [1-3, 6-7], are contained in the yellow circles. Each includes

Publication History

Manuscript Received : 12 August 2014
Manuscript Accepted : 26 August 2014
Revision Received : 28 August 2014
Manuscript Published : 31 August 2014

multiple solid matter bounded by the gel one. The large white matter represents a giant light matter formed by the solid matter interconnected together through the blue gel matter. The marked region of Fig. 1(a) is more detailed in Fig. 2(b). Definitely, the pink solid matter are linked together. This becomes the evidence that the involved matter are of the same positive energy. Fig. 2(c) shows a gray matter on top of the white matter. It is known that the Ta and Re have gray blue and silvery white colors, respectively [18-19]. Therefore, the blue colored gel mater and gray matter shown in Figs. 2(a) and (c) match the Ta. The other white matter then corresponds to the Re.

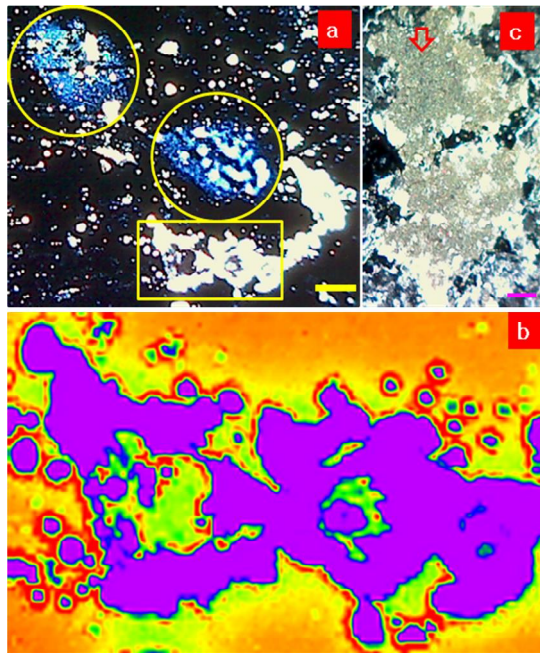


Fig. 2 Photon gels and merged light matter

Fig. 3a shows a photon gel collected on a plastic substrate. Fig. 3b, the colored version of Fig. 3a, more clearly distinguishes light matter included. The region marked in Fig. 3b is detailed in Fig. 3c. This verifies that the gel matter is filled with tiny light matter.

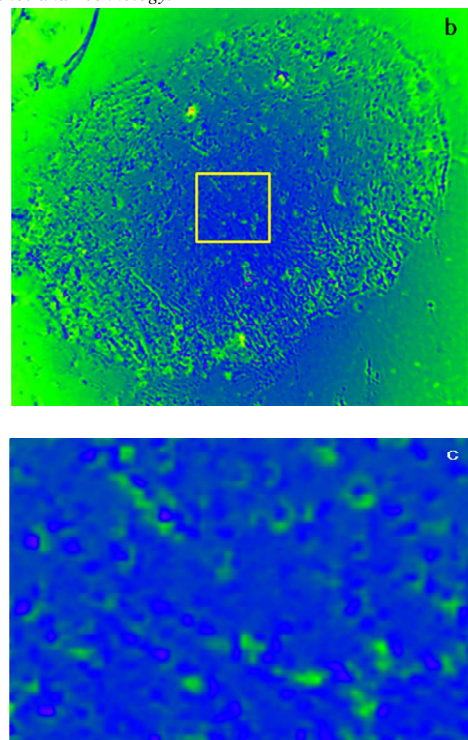
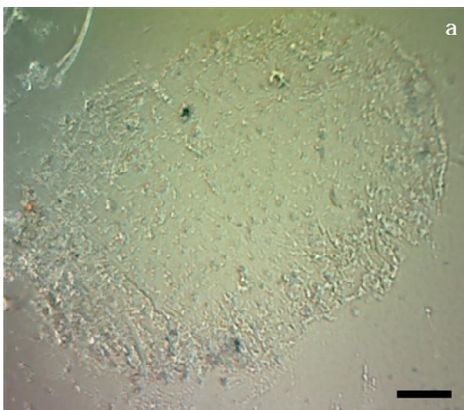
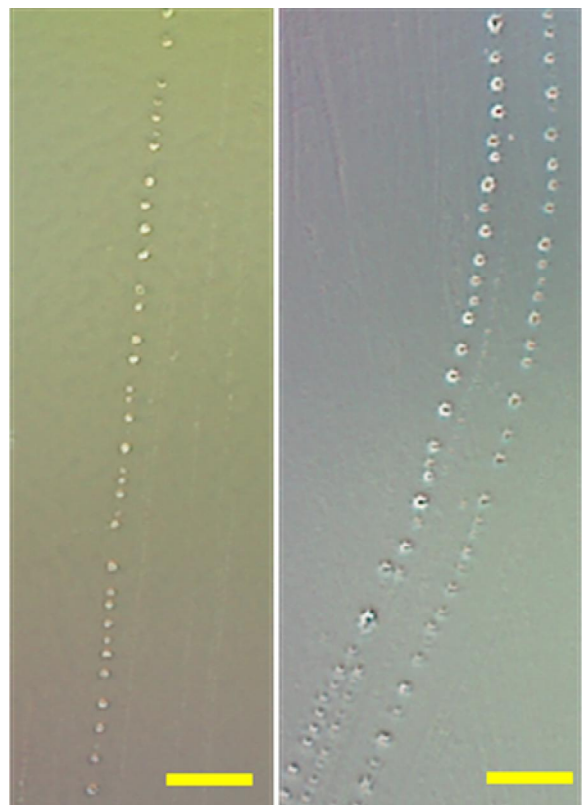


Fig. 3 A sub-photon gel.

Fig. 4 shows beams of light matter collected on a plastic with the wet surface. The left image shows light matter moving straight and the right one two streams of light matter turning to the left.



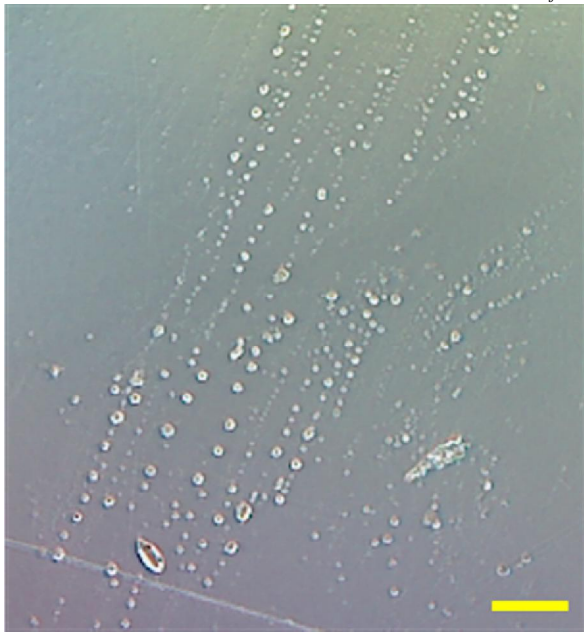


Fig. 4 Beams of light matter

Fig. 5a shows a beam of heavy light matter superimposed on the multiple beams of tiny light matter. Fig. 5b is the colored version of Fig. 5a. The region marked in Fig. 5b is illustrated in Fig. 5c. This elucidates the distribution of underlying beams composed of tiny light matter as well as the connection structure of upper large light matter.

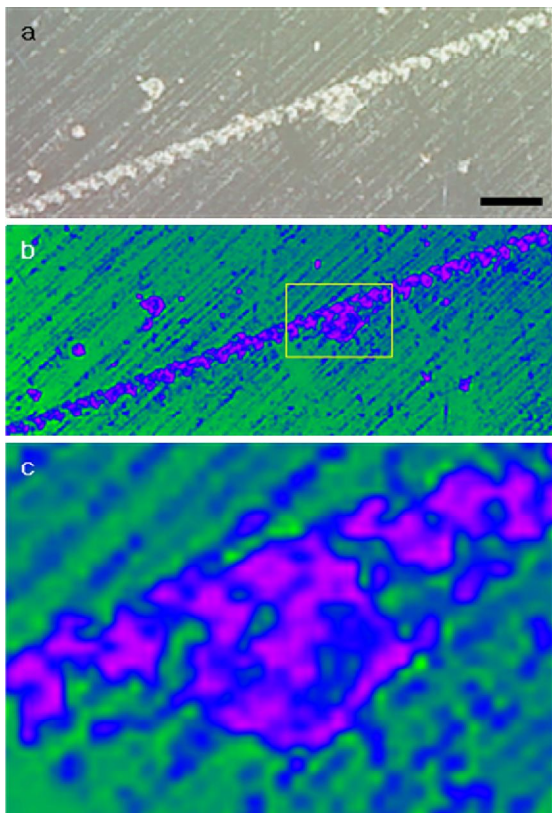


Fig 5. A heavy light beam on the beams of tiny light matter

Fig. 6a shows large light matter moving straight. Fig. 6b is the colored version of Fig. 6a. The region marked in Fig. 6b is magnified, and the magnified image of Fig. 6c illustrates the presence of tiny light matter left by the large matter. Similar phenomenon has already been noted in the works [2-3]. A total of 6 streams of tiny matter is able to be identified as numbered from 1 to 6. The significance of this structure toward the 3-D structure of an electron orbit is to be reported [13-16].

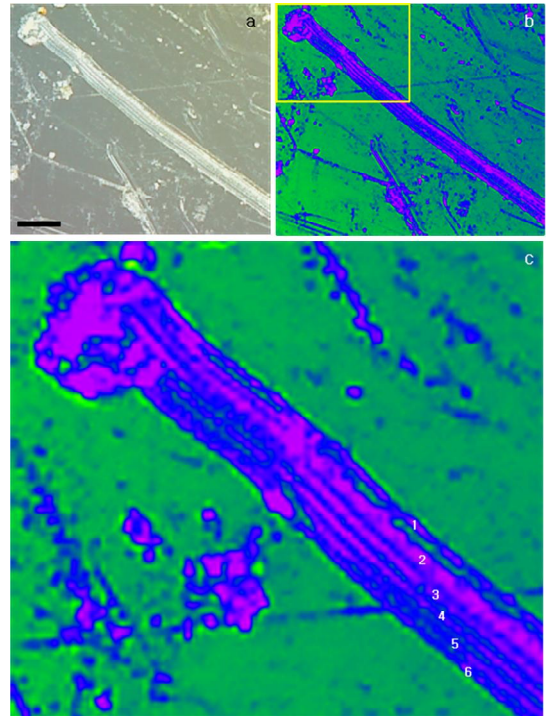
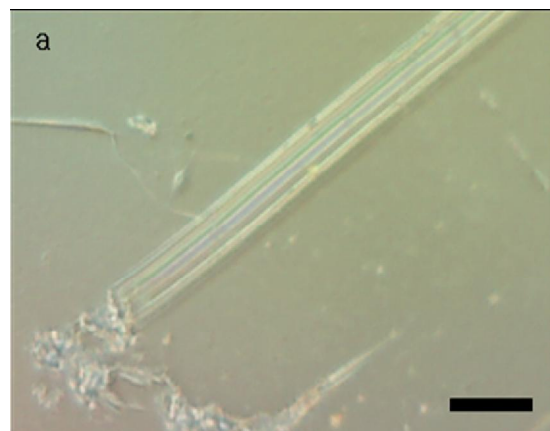


Fig. 6 Traces of large light matter

Fig. 7a shows another moving light matter leaning smaller ones. Fig. 7b is the colored version of Fig. 7a. Fig. 7c corresponding to the region at the bottom left in Fig. 7b shows that the leading matter is a kind of a photon gel. The constituent solid and gel matter are represented in pink and blue mixed with green colors, respectively. The existence of solid matter in the paths left is indicated by the arrows in Fig. 7d, which corresponds to the upper region marked in Fig. 7b.



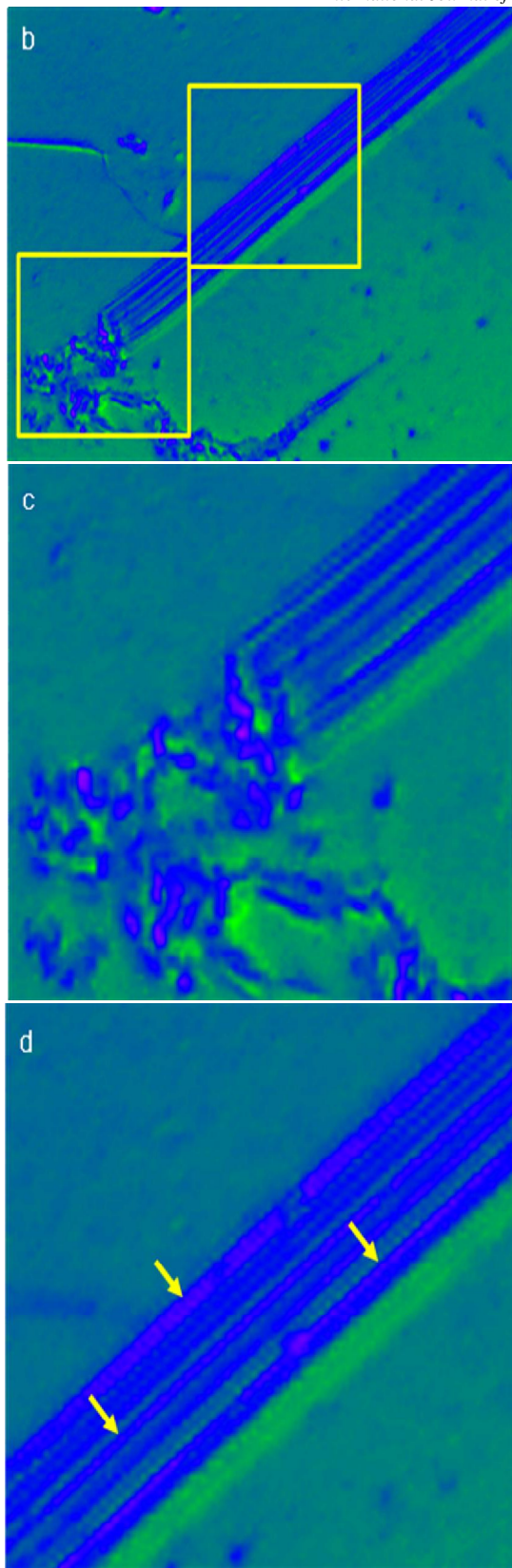
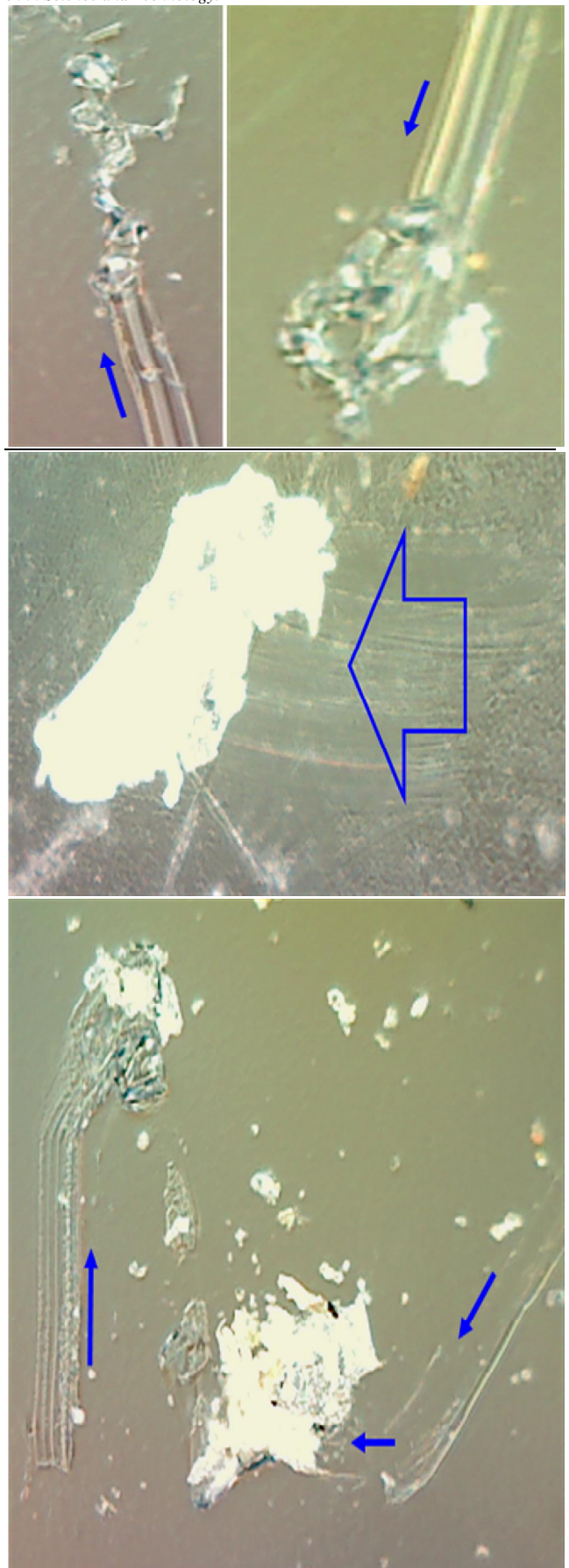


Fig. 7 Light matter leaving tiny matter

Fig. 8 shows a collection of light matter moving on a wet glass. The arrows indicate the moving directions.



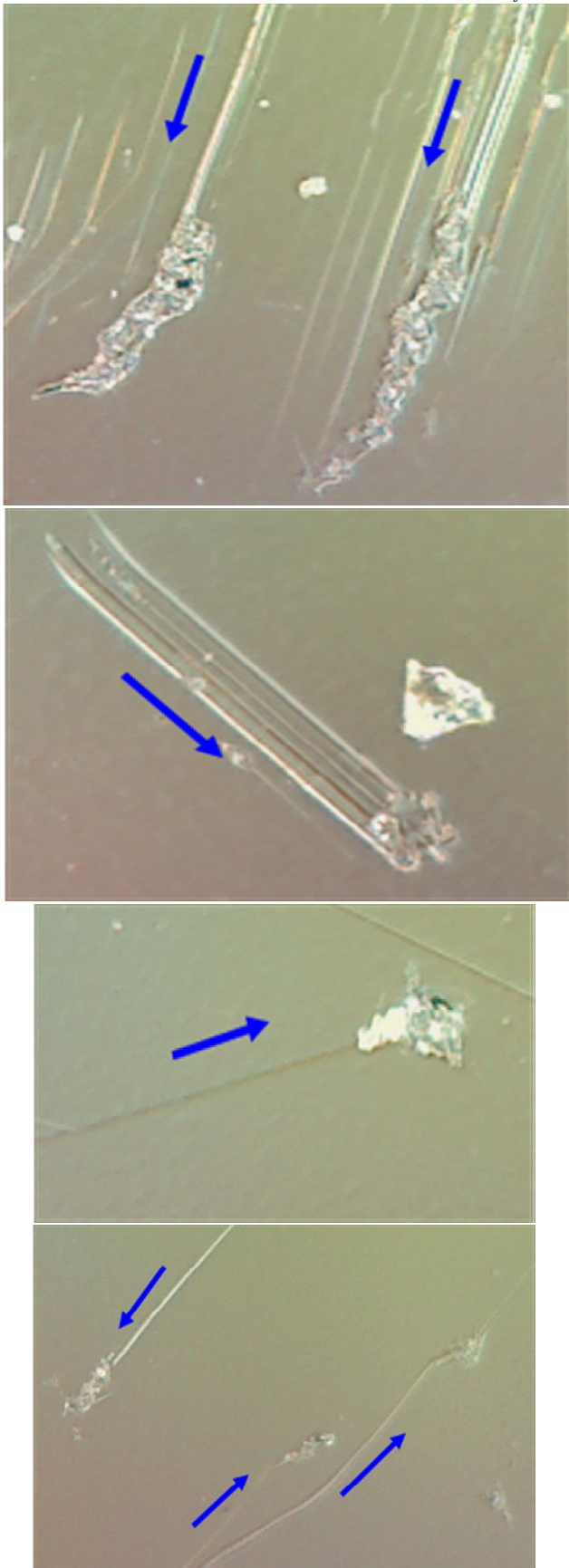


Fig. 8 Collection of moving light matter

Fig. 9a shows light matter moving in the spiral fashion. This is more clear in Fig. 9b. The region marked in Fig. 9b is detailed in Fig. 9c, which clarifies that the pink solid matter are linked to one another through the blue gel matter.

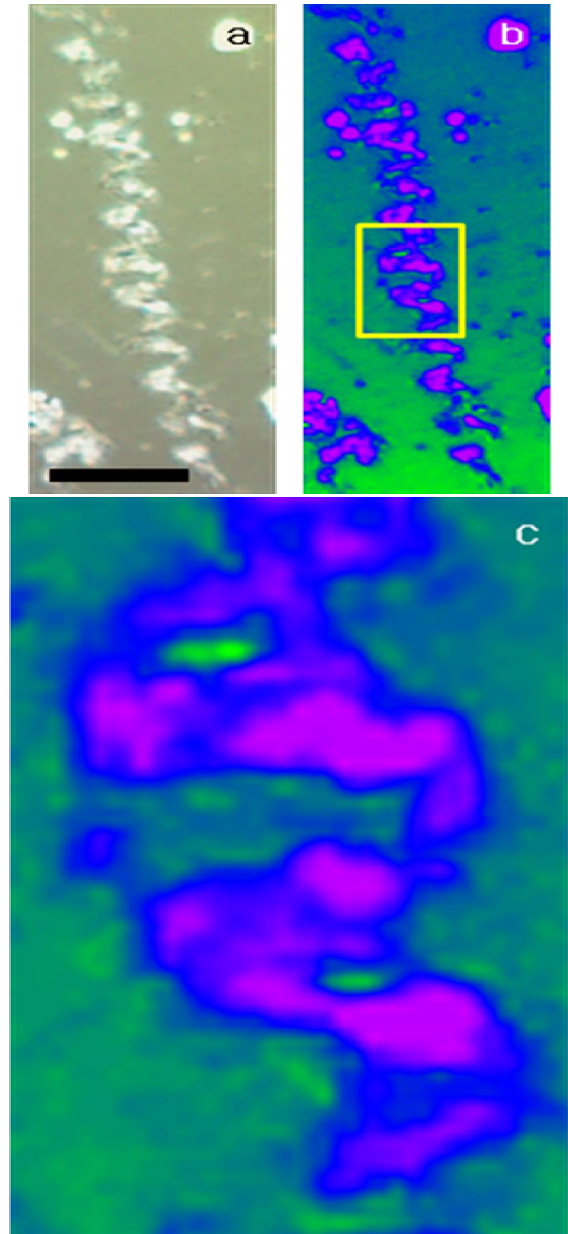


Fig. 9 Spiral light matter

Fig. 10a shows a photon gel collected through a water drop on a wafer with being exposed to the light of laser. The laser is a Nd:Yag type operating at a wavelength of 532 nm. The power level was 26 mW. The photon gel of Fig. 10a is similar to those of the reported Sun light [1-3, 6-7]. Fig. 10b shows a giant solid matter surrounded by the gel matter whose presence is convinced by the green matter exhibited in Fig. 10c. Fig. 10d shows light matter attached to the edge of the wafer. This confirms that they are sticky. Another sticky matter is noted along the paths on a wet plastic substrate as illustrated in Fig. 11a. A few white matter are attached to the

path. This is detailed in Fig. 11b corresponding to the region marked in Fig. 11a. The image illustrates that the pink solid matter is connected to the blue gel matter of the path through its surrounding gel matter.

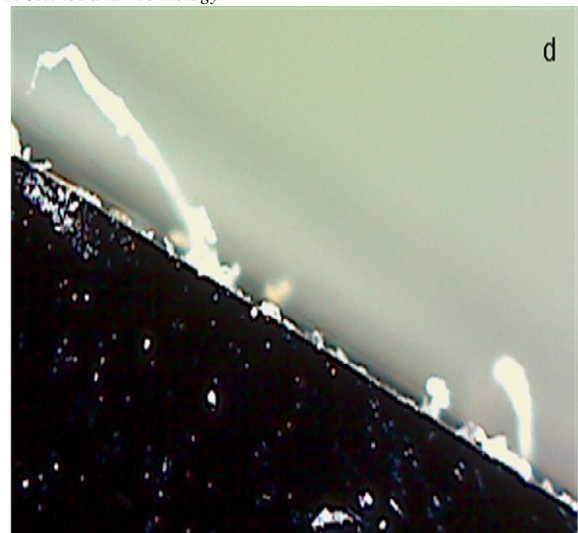
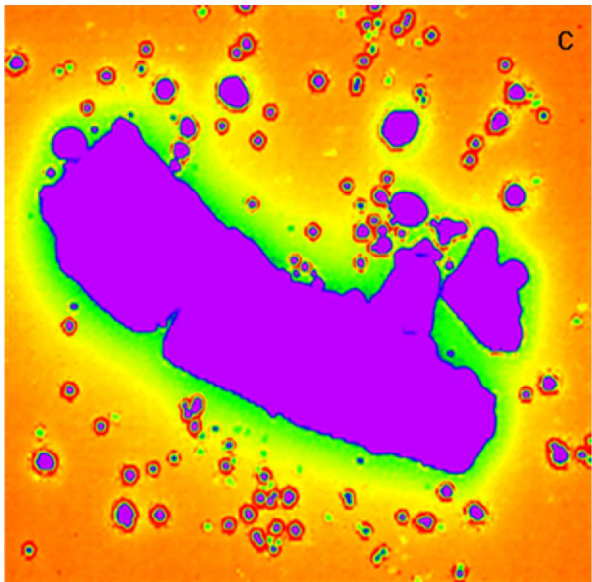
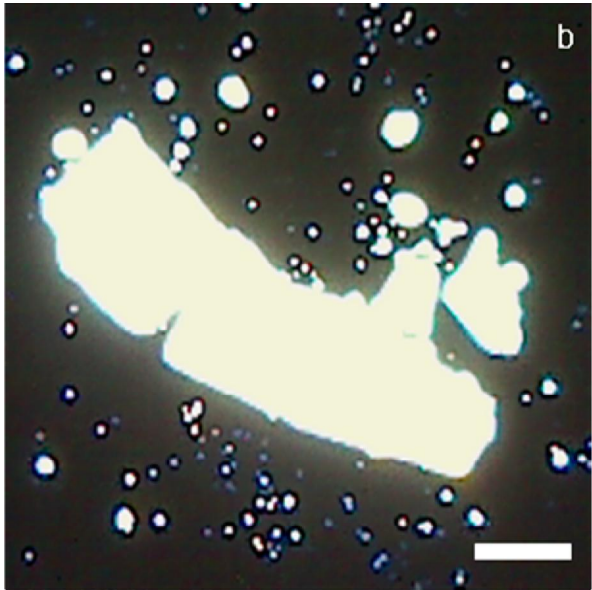
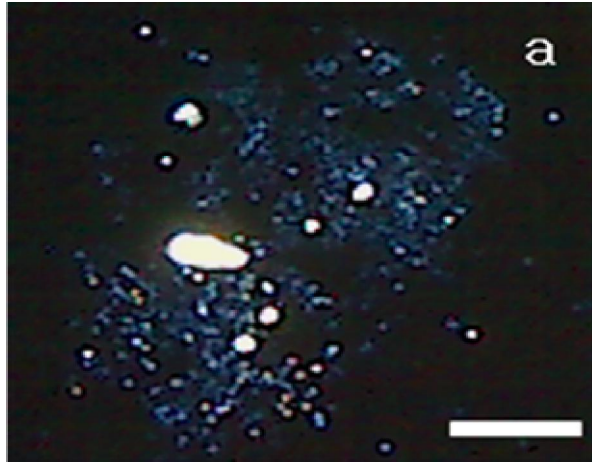


Fig. 10 Matter of laser light on wafer

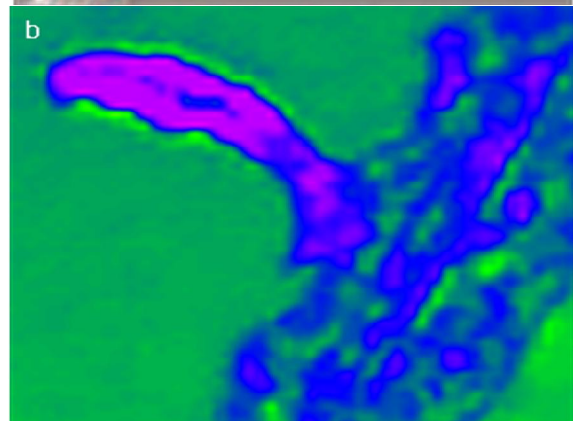
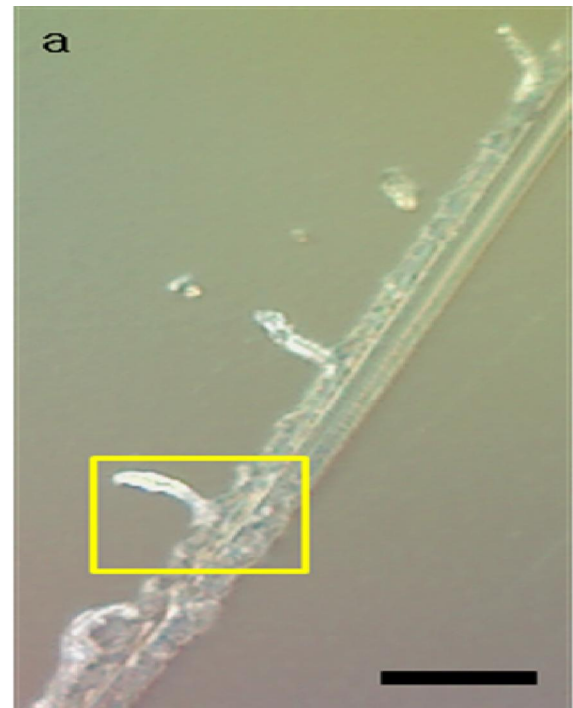


Fig. 11 Light mater attached to the path on a plastic substrate

Fig. 12 shows a number of path left by the moving light matter. The subsequent colored version facilitates their separations.

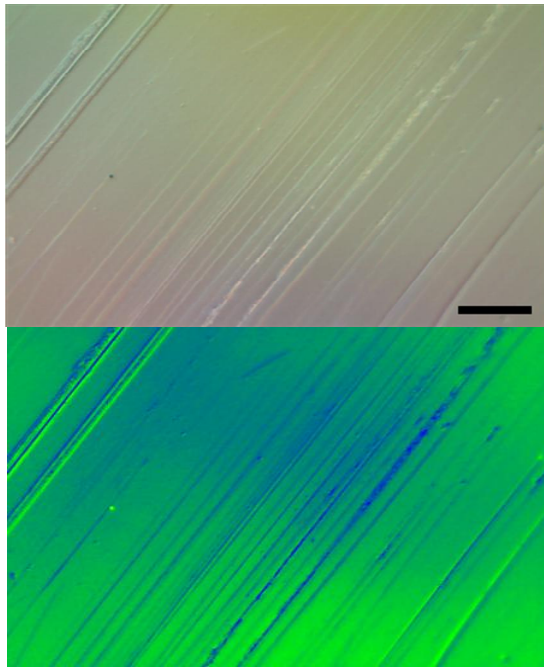


Fig. 12 Paths left by light matter

Fig. 13a shows multiple paths sharply turning around. In the colored Fig. 13b, 6 paths are identified. The three light matter involved in the path 2 are detailed in the subsequent in individual images.

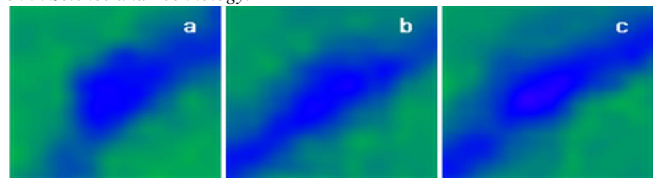
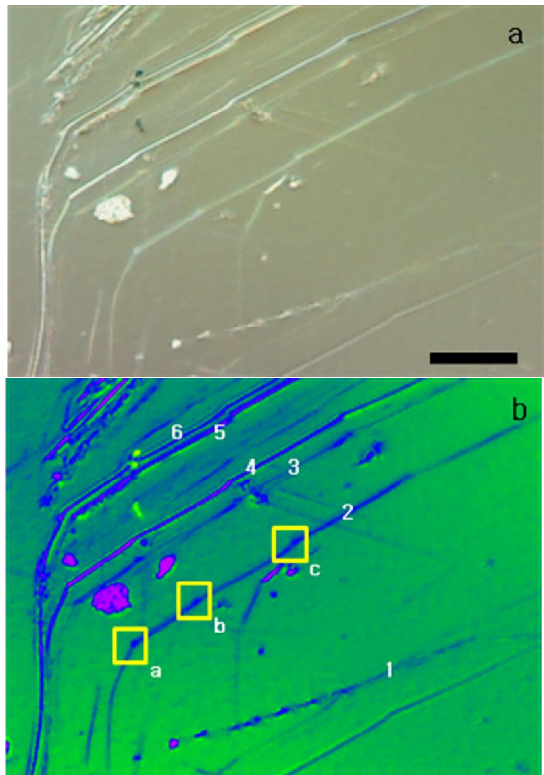


Fig. 13 Paths of light matter

Fig. 14a shows a path formed by light matter. The existence of the light matter left by it is evident in the colored Fig. 14b. The 4 parts marked in Fig. 14b are shown individually in the subsequent images, detailing matter and particles in the respective regions. The light matter are interconnected together.

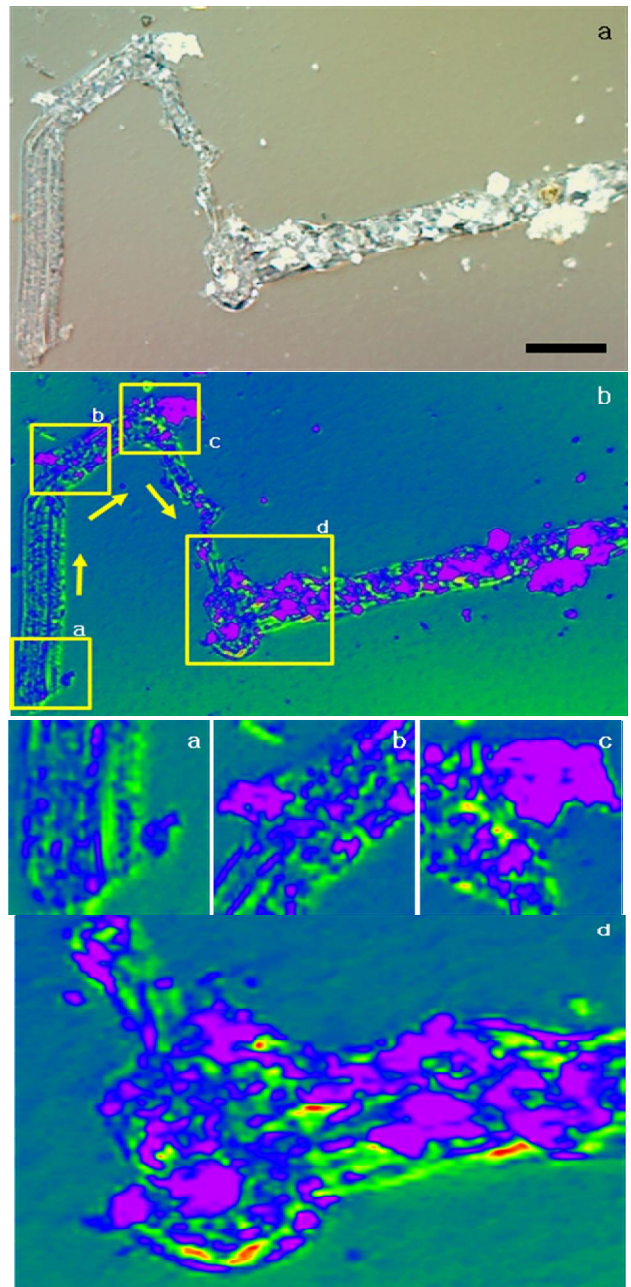


Fig. 14 Photon gel sharply turning

Fig. 15 shows another two photon gels just arrived and stopped. The matter structure is detailed in the subsequent colored version of Fig. 15.

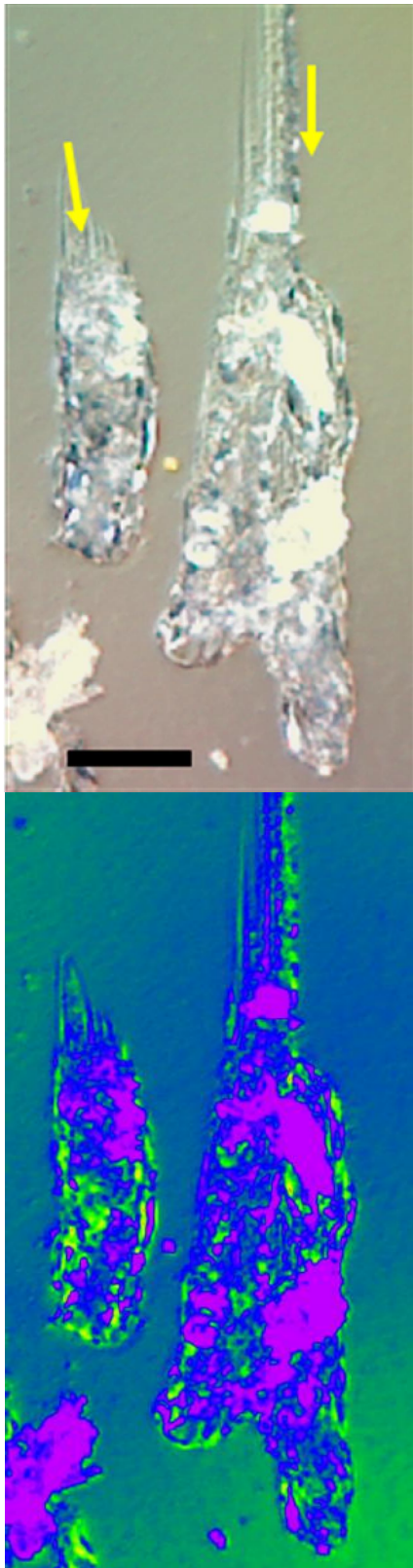


Fig. 15 Photon gels just arrived

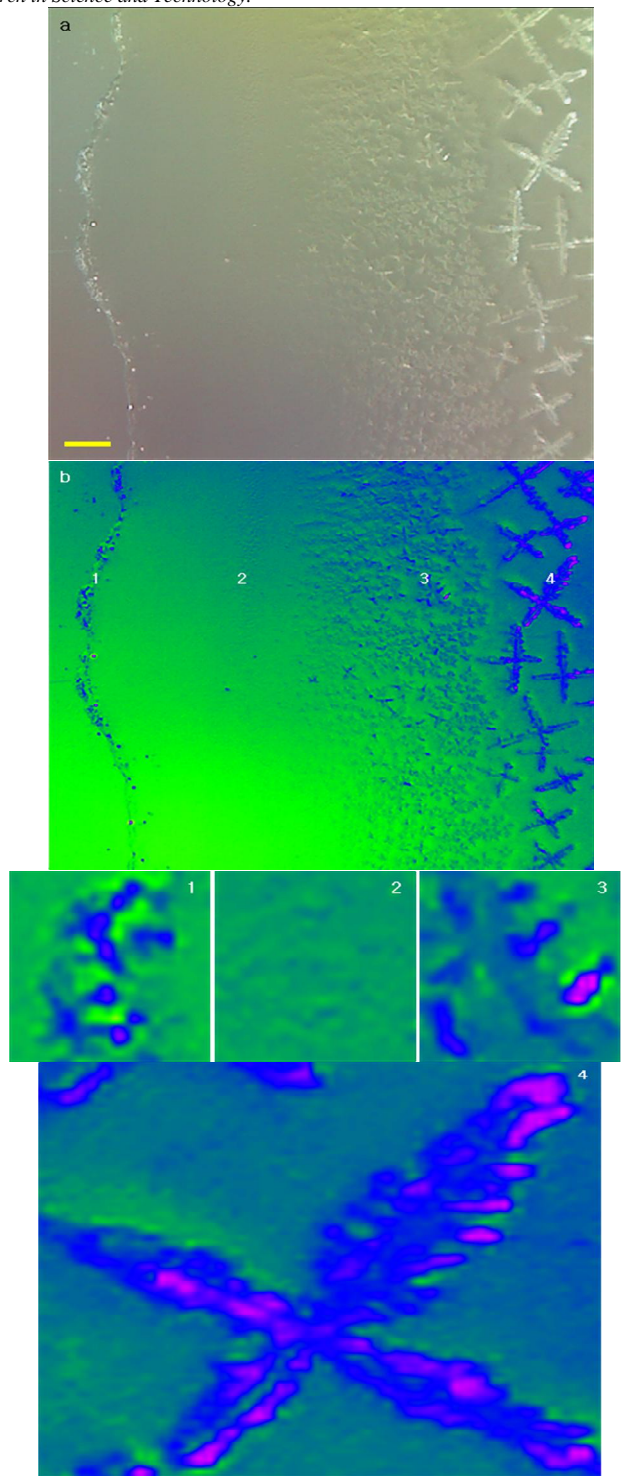


Fig. 16 Distributions of light matter within the water

Light matter can be collected by means of a water drop placed on a substrate. A few minutes and hours might be taken until the water drop dries up depending on the amount of the water drop and intensity of the Sun light. One to two centimeters of a water drop in diameter are enough to observe various constructions formed by the light matter. A device for collecting two solid and gel matter in a separate fashion irrespective of the water was developed [14].

A number of light matter might pass through the water drop as it is exposed to the Sun or laser light. The entered light matter are then accumulated inside it. The positive energy of light matter is consumed to decompose the water drop. The water decomposition accompanies the ionization of water molecules into hydrogen and oxygen ions. Evidences associated with this are to be reported.

Fig. 16a shows a distribution of light matter on a glass. The presence of light matter is able to be more clearly confirmed from the colored version (Fig. 16b). Distributions of light matter in each region are detailed in the subsequent images, which correspond to the small regions around the numbers. The cross-shaped construction located in the region 4 is exactly the same as that reported in the work [2].

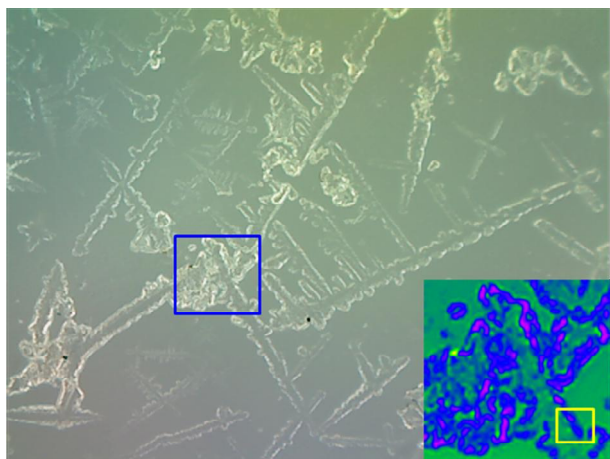


Fig. 17 Constructions by light matter on a glass

Fig. 17 shows light matter collected through a drop of water on a glass. Several constructions made by the light matter appear. Similar ones were once reported [2]. The bright parts of the constructions represent the light matter reflecting the incident white light from the microscope. The connections between the light matter are clear in the magnified image placed at the bottom right

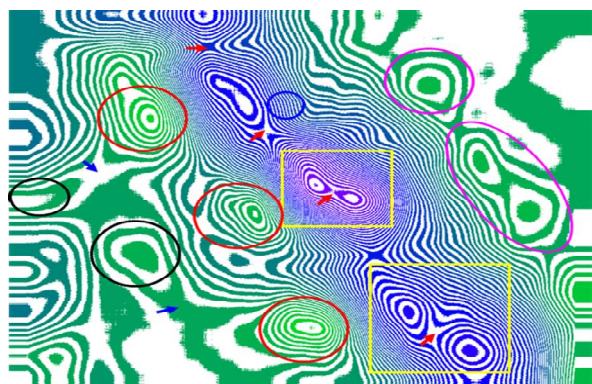


Fig. 18 Energy orbits

Fig. 18 shows energy orbits distributed in the region marked with the yellow box in the bottom right image of Fig. 17. The energy orbits drawn with the technique [15] are quite

helpful to identifying shapes of matter. The red arrows indicate 4 bonds through which the plasmon carriers are interconnected on top of the solid light matter. Interestingly, the orbits contained in the two different red and pink circles are much different in the number of confined orbits. The 3 matter contained in the red circles have 10, 10, and 12 confined orbits from the top. The formation of dense orbits is typical of atoms or ions as demonstrated in the work [16]. Moreover, they seem to be attracted to the positive light matter, which signifies that they are negative in charge. From the two noted features, the three matter are suspected to be negative oxygen ions. This arises from the fact that the water is decomposed by absorbing the positive light energy as stated earlier. This is further supported by the bonds between one of them and negative surface plasmon carriers. The validity of the identified negative oxygen ions need to be further verified through other measurements. Meanwhile, the matters contained in the pink circle much smaller number of confined orbits and they are believed to be the matter placed inside of the surface plasmon carriers as identified in the earlier work [3].

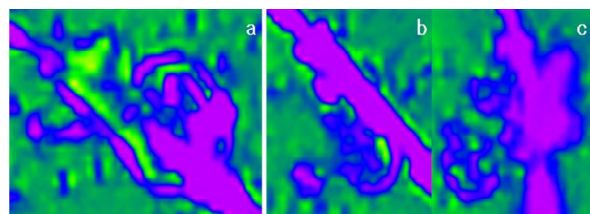
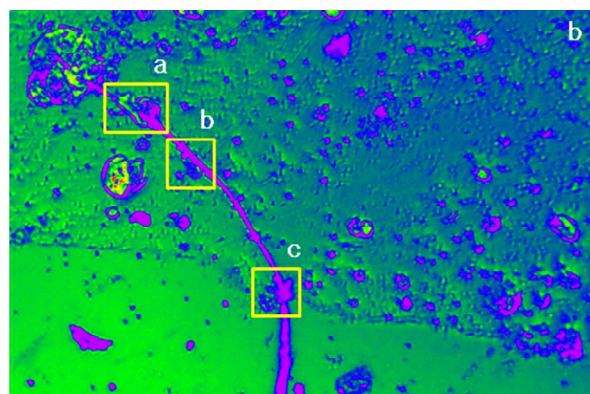
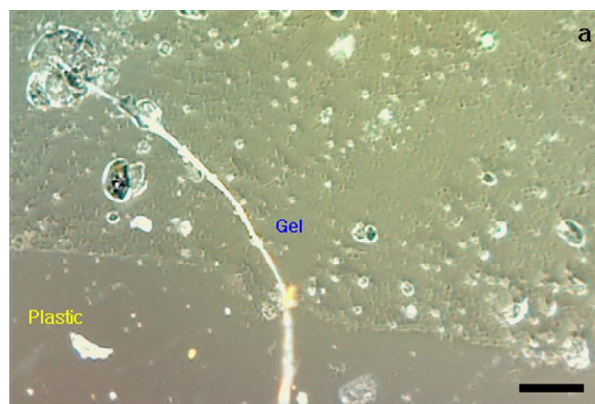


Fig. 19 Photon gel with a long string of light matter

Fig. 19a shows a photon gel on a plastic substrate. A very long string appears on top of the thin gel layer. The light matter are more clearly distinguishable in the colored version (Fig. 19b). The shapes of the three parts of the long string are detailed subsequently. Other constructions by light matter are illustrated in Figs. 20-23.

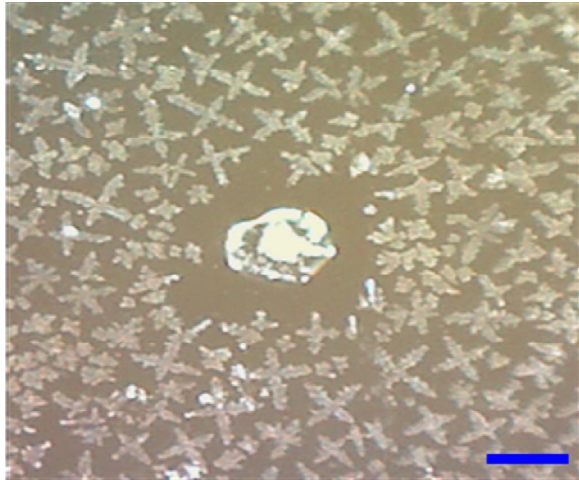


Fig. 20 Construction by light matter



Fig. 21 Construction by light matter

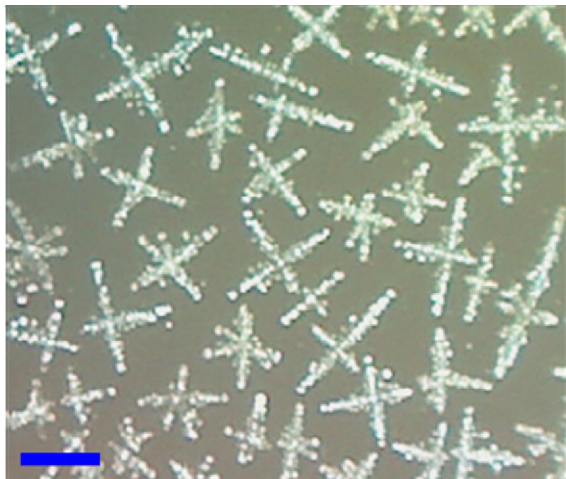


Fig. 22 Construction by light matter

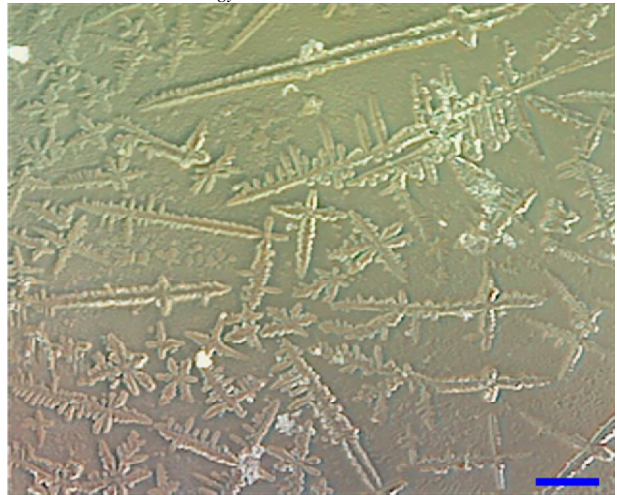


Fig. 23 Construction by light matter

In this work, an enormous set of images of photons coming from the Sun as well as from the laser light were presented. These experimental images are thought to be enough to confirm that the photon is a matter, that light matter is composed of solid and gel matter, and that light matter carries hot electron energy originating from the electron orbits of the atom. The materials to be reported may include high resolution images of light matter, nano-scaled matter, and further XDS measurements [3, 17-20].

III. CONCLUSIONS

Experimental ways to collect photons (matter) of the Sun and laser were demonstrated. It was verified that light matter could be collected with ease simply by waiting certain amount of time with the prepared substrate exposed to the Sun or laser light. Nice and peculiar constructions can be obtained by collecting light matter through water drops. The light matter was once confirmed to have transition metallic chemical elements, one of the rare or rarest ones on the earth. The easy collection of light matter may eliminate worries on their exhaustion in the earth. The associated industries are expected to make an unprecedented growth with the light matter collectable freely and indefinitely until the Sun is alive.

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