READING 9

Part 1

This time we shall give two applications of last week's diagram, one to Science and the other to Art. Note that in each cycle per second there is not *one* inner octave on this scale but 30 octaves (for $10^{10} \approx 2^{30}$), and in every kilocycle per second there are 30 octaves of the sort of energy which Emotional Centre would use at its full speed. It is worth noting that this frequency relation explains 1) the great fluidity and evanescence of psychological as compared with bodily events, and 2) the stillness and silence of the world of Emotion when working at high frequency.

(Discussion)

PART 2

With regard to the application of this diagram to the scientific problems we have been lately discussing, here is a good, clear letter from John Allen (Chairman of our Maths Group):

Your last letter, with its injunction to keep abreast with modern knowledge of the way biological machines work, has thrown a completely fresh light on our discussions about machines.

I now see that a great deal of confusion is caused by not taking into account the different levels of energy and consciousness with which machines of different types can work.

If I can summarise the present stage of our discussions in the Maths Group:

Computers and machines like them operate with mechanical energy and it is complete nonsense to try to equate them with machines working with biological energy, and still worse to attribute to them qualities (or possibilities) dependent on access to psychological and conscious energy.

Man in his ordinary states of consciousness is a machine, but he is a biological machine operating under quite different laws to a machine like a computer or a motor car.

Moreover he has access to higher forms of energy, and when these work in him he manifests qualities which are quite miraculous in relation to the world of machines – such as discovery, invention, formulations of every kind which are characterised by his 'power of reason', his 'genius' and so on.

Therefore we come back to the simple table of energies which you gave us some time ago. This adds quite a new dimension to our thinking about machines.

In the light of this, what are we to make of Lord Adrian's reported statement: 'Machines can reason as well as or better than man, but we do not believe that they are conscious, aware that they exist as individuals... the science of living creatures has a great many questions to settle before it is fair to ask it why human beings are conscious.'

It seems that this is a very good example of seeing different levels all on a flat plane, and it also throws up this problem of people understanding different things when the same word is used.

If we are to make any headway in this quagmire, we must have very clear conceptions of what we mean by consciousness, reason, individual, machine and other key words in science and philosophy.

This is the problem the Maths Group is up against at the moment and I would very much welcome your comments on this.

COMMENT

He is referring of course to the System description of 'Four Categories of Energy' manifested simultaneously through the Universe from the Galaxies to the Moon:

- 1. Mechanical Energy
- 2. Biological or 'Life' Energy
- 3. Psychic Energy e.g. Intelligence
- 4. Conscious Energy

The Ray of Creation shows by means of the Principles of Scale and Relativity how these four kinds of energy change from All Worlds (absolutely Conscious) to the Moon (absolutely mechanical). The three-storeyed factory of man is designed to transform one kind of energy into another.

Discussion: How can we apply this, and what can we usefully say to the Maths Group?

PART 3: A NOTE ON ART HISTORY

[The same diagram, but write in 'Appearances', 'No-man's land', 'Reality'.]

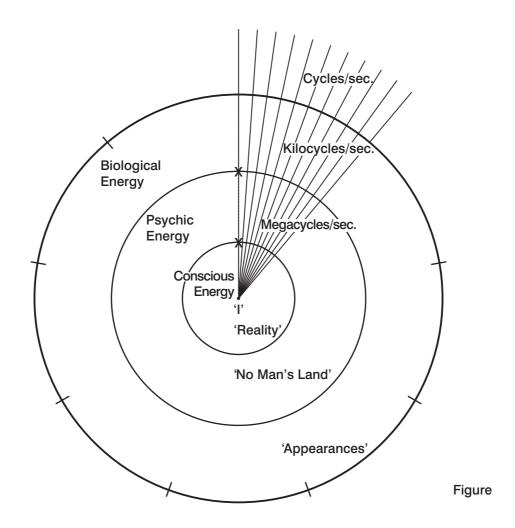
We can use the same diagram to see that the painter, if he is merely copying Nature (however skilfully), is sitting on that outer circle looking outward. If he is bringing in his own reactions to Nature he is looking partly outwards, partly inwards, but he is still in the 'No-man's land' of a very subjective world. The less he looks at Nature and the more of himself he brings in while using comparatively low-powered energy, the *more subjective* his art.

You see the problem? Now listen to this account taken (with slight correction) from the current number of *Réalités* (July 1964):

For centuries painters felt that beauty lay only in the faithful reproduction of *appearances*, whether in the case of Leonardo ('The most excellent way of painting is that which... renders a picture as similar as possible to the natural object it represents') or Dürer ('Do not imagine that you can better what God has created') or Ingres ('Art never achieves so high a degree of perfection as when it resembles Nature so strongly that it can be taken for Nature itself'). It was this certainty and this basic tenet of Western Art that were toppled some seventy years ago when painters began first to deform and finally to reject the world of *appearances*.

This mutation... could be already sensed in Delacroix when, for example, he described in his Journal his contemporaries who were 'crushed by the despairing perfection of certain effects they find on daguerrotype (early photographic) plates'. This observation soon led him to another, which was to be basic to the concept of abstract art: 'Music is the supreme art... yet what does it imitate?'

How can the artist go beyond mere resemblance, and what should his attitude be towards reality? Every twentieth century painter has, at one time or another, been forced to take a stand when confronted by this basic question of his era. They have produced a number of answers... that enable us to indicate their positions on the vast chessboard of modern art.



But all these attempts – Dadaism, Surrealism, Pop Art, the Fauves, Cubism, Futurism, Kandinsky's 'Blaue Reiter' Group, Expressionism, Mannerism, New Impressionism, Abstraction (Informal and Geometrical), and the new 'Kinetic Movement' of Calder and Nicolas Schöffer – all of them get lost in the 'No-man's land' of the subjective world.

The Meditation has shown us that to enjoy Reality and true Abstraction, it is necessary to penetrate deeper to that still world of high energy.

(Discussion)

If only the painter would take the trouble to go deep to the 'place of the Creative', then he would have many choices other than simply copying the world of appearances. There is, for instance, the world of true Abstraction where Cosmic Laws might be illustrated. Or he could turn once more to the world of Nature and use some of its contents to express symbolically for what in the Real World has no sensory language. In this relation we can remind ourselves of the old Zen saying:

To a man who knows nothing, mountains are mountains, waters are waters and trees are trees. But when he has studied and knows a little, mountains are no longer mountains, waters no longer waters and trees no longer trees. But when he has thoroughly understood, mountains are once again mountains, waters are waters and trees are trees.

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