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An example showing one of the many characters associated to the
"DELINEATIO MIRABILIS" (DM).

   The DM (graphic) which was cursorily introduced (see ruggeri7) is encompassing the Lorentz's graphic which was an improvement over the attempt made by Galileo in the effort to represent the universal reality and has the potential to produce a dramatic advancement though not a complete solution of the problem (which to my opinion can be achieved only in terms of approximation).
  As already mentioned its simple aspect is (to say the least) deceiving, but this simplicity of character is justified from the fact that more than one physical phenomenon which this graphic can describe is hidden since, either is still unknown or badly interpreted or only partially recognized.
   Therefore in order to present the graphic in its three-dimensional glory, advances must be made allowing the overcoming of the physical pitfalls laying in the way and impeding the achievement of a reasonable understanding of it.

   As preface to the understanding of the DM it must be reiterated that in the attempt to achieve a solution, the use of analytic methods is determinant, since only the proper analytical choice will lead to the solution and there is an high probability that an unwise use of mathematic-geometric tools can introduce spurious solutions of no value in the physical reality and invariably produce confusion.

  As a rule (though unsubstantiated by demonstration and therefore empirical) the mathematics and the geometries associated to physical phenomena, must be maintained as simple as possible, in order to avoid the almost sure insertion of error in their descriptions.

   The DM satisfies well this last requirement and, with it, the intuition of the phenomena which it intends to describe results facilitated, as one can see that along the line of observation SO is used a polar system of representation and the graphic DM offered to the reader is contained into a plan defined by the line of observation of S from the observer in O and the line of movement v_L of the system S.
  As one must notice whilst studying the DM, from the position S the velocity can be directed in all the directions but cannot exceed the limit circle of existence of a signal moving at c speed from an object in quiet, which is a maximum that cannot be exceeded in any circumstance.

  Note: the limit circle of existence of a signal emitted from S (be it in quiet or in movement) is here presented under the assumption that a time t has elapsed from the moment a signal moving at c speed inside the Euclidean space forming the system surrounding O in quiet, was emitted and whilst received by the observer in O is also present all over the limit circle of radius $\rho = ct$.
  Note: if we turn the plan of observation along the line SO the "limit circle of existence" becomes a "limit sphere of existence" encompassing now in three-dimensions all the possible physical values of velocity v_L from S as observed from an observer in O.

 Now, since the DM is representing an effort made in order to achieve representation and at this stage is considered in simplified form, special physical limit cases are not considered and for the moment we examine and describe only the more evident physical phenomena.

  The system O considered here is a complete solar system having a mass M_{LGM} in the center and the observer in O in this particular presentation is considered to be part of a system in absolute status of quiet but enabled to measure the absolute universal Newton Time from its orbital condition of movement, and this status of quiet represents a limiting factor, since the status of quiet of a system is generally uncertain. In the other hand S is also a complete solar system (if we want to suppose that there is an observer capable to make observations, since it is unlikely that we can position an observer in an object emitting light (a star), that observer will have to be situated inside an object in orbit around the said star, just as we are presently in orbit around the sun).
  Once these preliminary physical conditions are understood, the picture must result more clear and one can say that the DM is an extension of the Lorentz's graphic which is supposed to study the signals reaching an observer which is part of a gravitational system in which though he is orbiting around a mass M_{LGM} assumed in quiet, he is capable to measure the time in conditions close to the Newton Time (which is the universal time) and given the distance from S there is no gravitational interaction between the two systems (though both are gravitational on their own) and their orbital trajectories as well can be overlooked and the whole gravitational systems concerned, assumed to be concentrated in a point (the point of emission of the signal and the point where is the observer).
  Only under these conditions can the DM acquire physical meaning and the reader on its own will have to realize that the DM is consisting of an exercise intended to give the simultaneity of position of an object observed from O, using the base data which were used in "special relativity" and if it solves satisfactorily the requested simultaneous representation is to be declared "capable to give a general representation of simultaneity for all the objects observed in the physical part of the universe surrounding us in O".
  We can now say that with the DM we start considering systems inside which the gravity prevails and once the distances are very large due to the fact that the gravity permits us to fix the universal time inside a system O we are enabled to

develop through the observation of signals reaching O, the picture of the whole detectable universe in conditions of simultaneity.
  We can then rightly call this picture "general".

   But then what can be said of the close representation which we need to make when the objects observed are under the effect of gravity? Can it be called general? I do not think so! At most we can call it "a local representation".

   The misunderstanding happened when the observations were made inside the laboratories of physic, since it was there that relativistic phenomena were at first observed and inside the labs was possible to observe similar phenomena and overlook the gravity.
  The rushed interpretations of the phenomena made at these early stages permitted the introduction of the quaint interpretation in vogue at present.

  I refer now to the introduction of the metric time concept, an idea of no physical value, but suited so well the world of mathematics and to the interests of the mathematicians to the point that it was imposed in the world of physics thanks to the good offices of professional mathematicians claiming an understanding of physics, and up to now has resulted impossible to refute and dislodge this theoretic approach.

   We have now a situation in which the practical physical scientist uses an instrument which measures the time in conditions close to those defined "universal" but the "official world of Science" in which the wisdom of the Mathematicians prevails, denies that in reality the time is the expression of a measure of physical transformation which acquires meaning only if the transformation is the gravitational one, which by the way is an universal phenomenon when the objects are in quiet and needs interpretation when the observations are made inside objects in movement.

Newton time in relation to a gravitational mass M_{LGM} (usually a red giant or a star, according to the size)

Note: Newton time is the rate of absorption of the Ether/ESF by an M_{LGM}
the absorption a constant amount k [kJ] of m-e by 1 [Ton] of mass
defines the time of 1 sec and this property is fundamental all over
the universe for systems in quiet and can be extended to systems
in movement under the hypothesis that the observer is inside the
system, nevertheless more conditions must be added in order
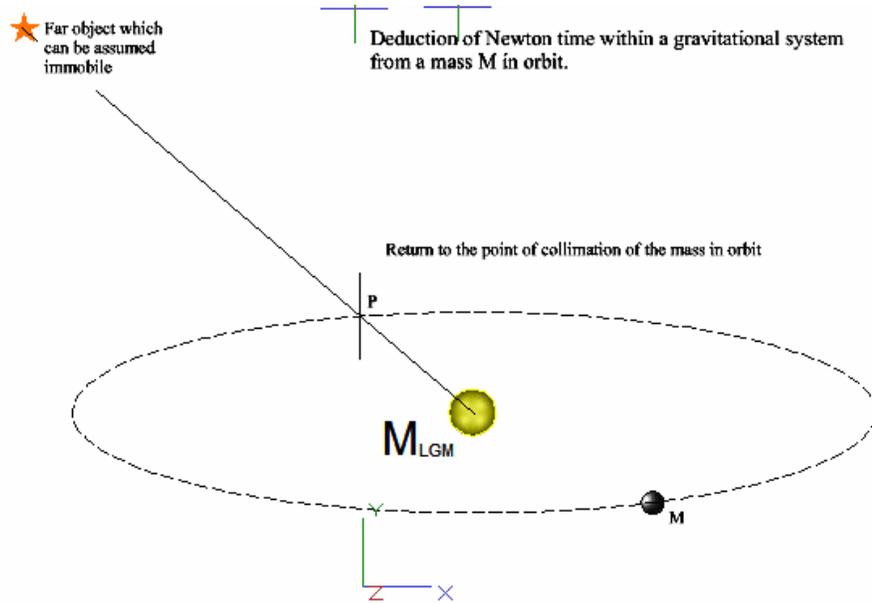to enable an observer inside the system to measure Newton
time.
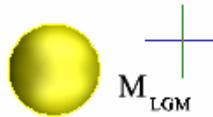
M_{LGM}

Absorption in mass equivalents
per second of standard universal
time referred to a system in
absolute quiet:

$$\Delta M_{RM} = \frac{k M_{LGM}}{c^2} \quad \frac{Ton}{sec}$$

Note: for v=0 the system border is infinite
since the ESF is reflecting an absolute
condition of quiet

Far object which
can be assumed
immobile

Deduction of Newton time within a gravitational system
from a mass M in orbit.

Return to the point of collimation of the mass in orbit
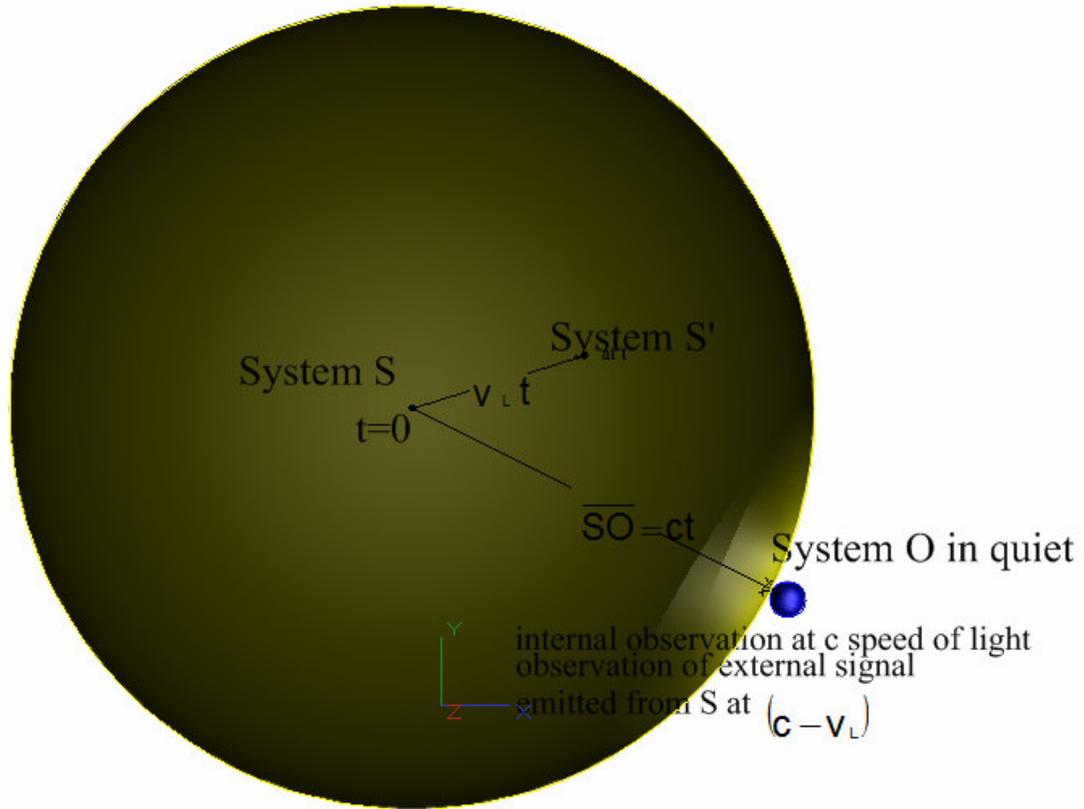
P

M_{LGM}

M

Z — X

orbital period :

$$T = \frac{2\pi r}{v_0}$$

Note: as one can check, the object in circular orbit runs the
distance v_0 in one second and repeats the orbital cycle
during a time interval of T sec.
Since v_0 depends from constant values it is its dependence
from k , the constant of absorption, which ties the
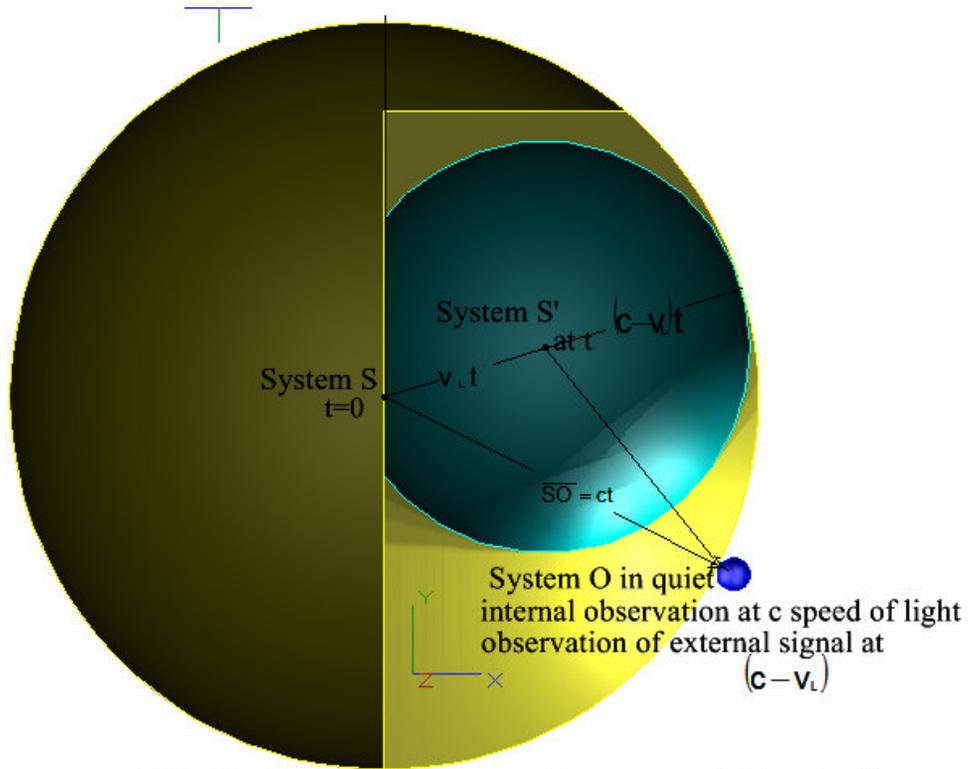object in orbit to Newton Time

orbital velocity: V_0
fixing the time of the system
as absolute universal, if the speed
of the system is v=0 or as local
absolute if the whole system is
in movement

$$V_0 = \sqrt{\frac{kM_{LGM}}{4\pi r}} \quad \frac{m}{sec}$$

Figure 1

System S'
at τ $(c-v_L)t$

System S
t=0 $-v_L t$

$\overline{SO} = ct$

System O in quiet
internal observation at c speed of light
observation of external signal at
$(c-v_L)$

Note: the border of the above sphere represents the natural
limit of expansion of the system S in quiet
Note: the above geometric characters are deducted from
the characters of the ligth reaching the observer

Figure 2