*GALILEO GALILEI'S NOBLE EIGHTFOLD PATH TO KINEMATICAL NIRVANA*

1. **Right Coordinates.** Begin by drawing the situation. Only by including thy coordinate axes may thou discern the direction in which to proceed.

2. **Right Instants.** Meditate and identify each important instant in the problem. If necessary, return to the beginning and expand thy drawing to clearly indicate every one.

3. **Right Variables.** Name each of thy servants, the kinematical variables $x$, $v$, $a$, *et cetera*. If a variable be different at different instants, distinguish it by an appropriate subscript. Although thy servants are—as all things are—without self, one must be consistent in these labels; much of human suffering is caused by the mixing of names.

4. **Right Quantities.** With this cleansing performed, reread the problem. Does it ask for an instant or time interval? A position or displacement? An average or instantaneous quantity? With the knowledge gained in the first three steps, thou canst now identify the known quantities and their values. Never forget that some data may be implicit in the problem statement.

5. **Right Equations.** Meditate deeply on the kinematical equations. Which relate desired quantities to known quantities? Meditation is not linear. Multiple equations may be needed at a given instant, or the same equation may be needed multiple times at different instants.

6. **Right Calculation.** Thou shalt now enter a turbulent period. Only by solving symbolically for the desired quantity canst thou achieve true mindfulness.

7. **Right Numerics.** With mindfulness now reached, substitute in thy numbers and convert thy units.

8. **Right Interpretation.** Gaze upon thy final answer to determine if it is at all reasonable. If it is not, repeat thy meditation. Failure to do so may result in rebirth back into this course rather than the realization of Kinematical Nirvana.

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