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**Components of a Computer System - Input, Process, Output**

System name: Acceleration of motion

What the system must do   
calculate the acceleration of motion in meters per second squared (m/s2) by:

1. Ask user to enter initial value and final value of velocity .
2. Ask user to enter initial and final value of time .
3. The system will subtract the initial value from final value of velocity.
4. The system will subtract the initial value from final value of time.
5. The system will divide the change in velocity by the change in time.

Hardware requirements ( if needed):   
 no hard ware needed   
  
Inputs with description:

Ask user to enter:

Number 1: The initial value of velocity (v**i**).

Number2: The final value of velocity (v**f**).

Number3: The initial value of time (t**i**).

Number4: The final value of time (t**f**).  
  
  
Process with description :

Calculate Δv by subtracting the initial velocity from the final velocity (Δv=v**f**-v**i**).

Calculate Δt by subtracting the initial time from the final time (Δt=t**f**-t**i**).  
Calculate the acceleration of motion() by dividing the change in velocity(Δv) by the change in the time(Δt) .  
  
Output with Description:

The average acceleration for that period in m/s**2**

Any other notes :