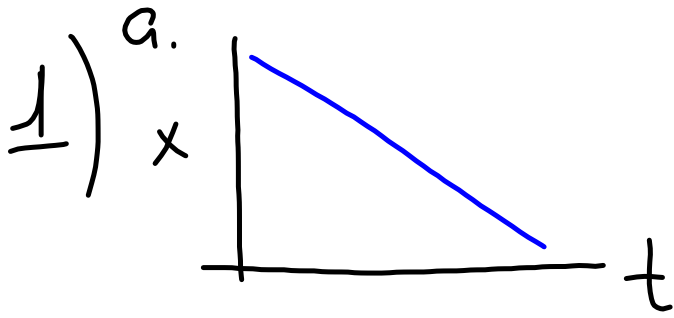
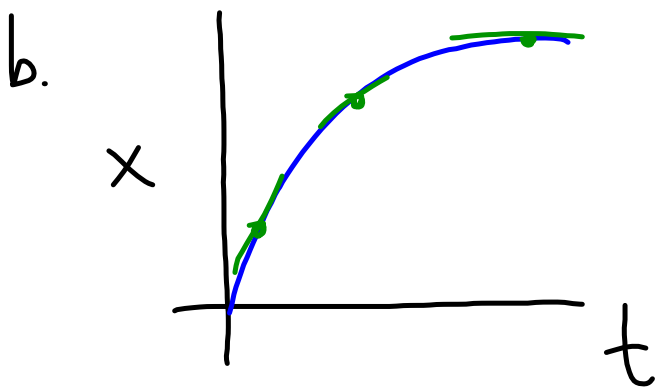


EXAM REVIEW - PART 2

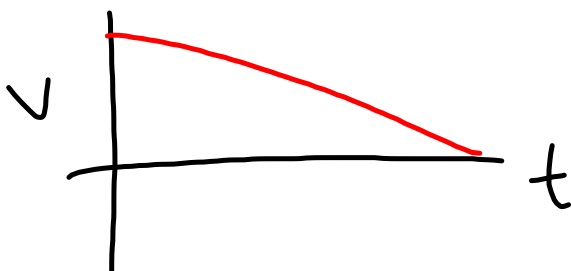
[Answers to Part 1 online → check your email]

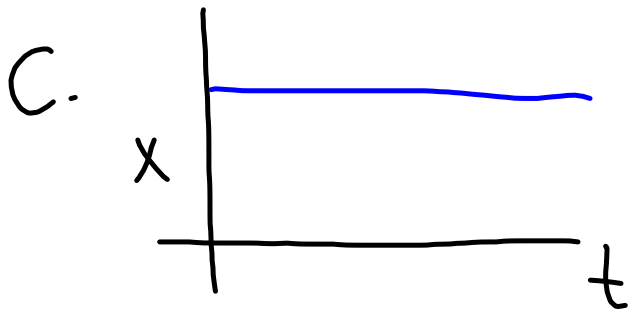


object moving
at constant
negative velocity

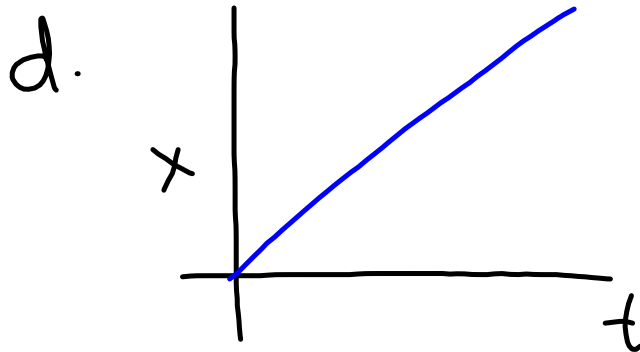
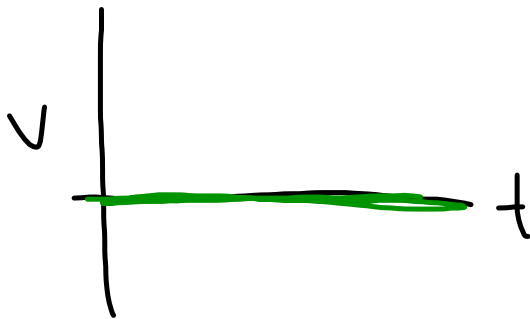


Starts with high
velocity, slows
to \emptyset

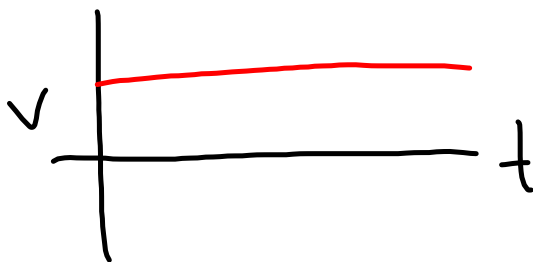




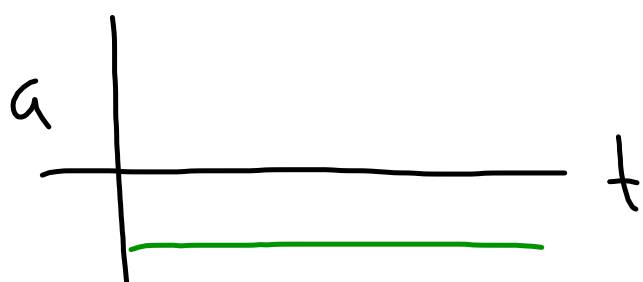
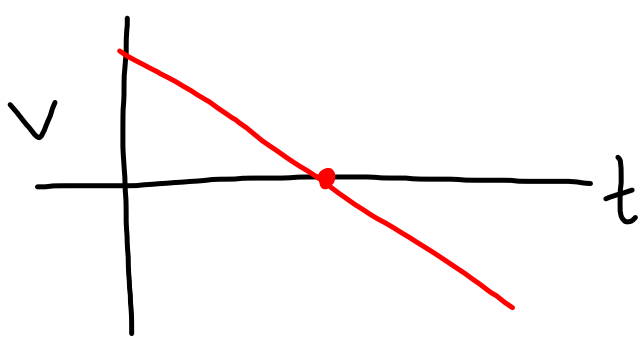
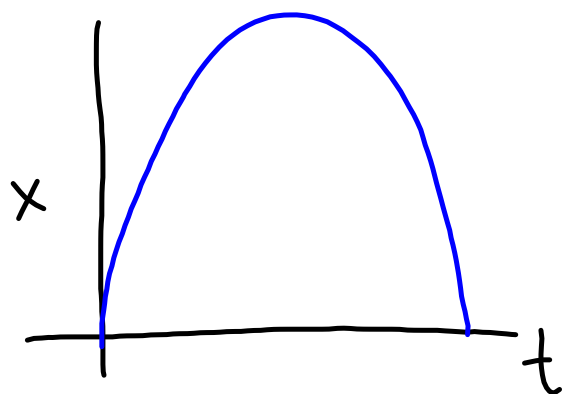
Object staying
in the same
position

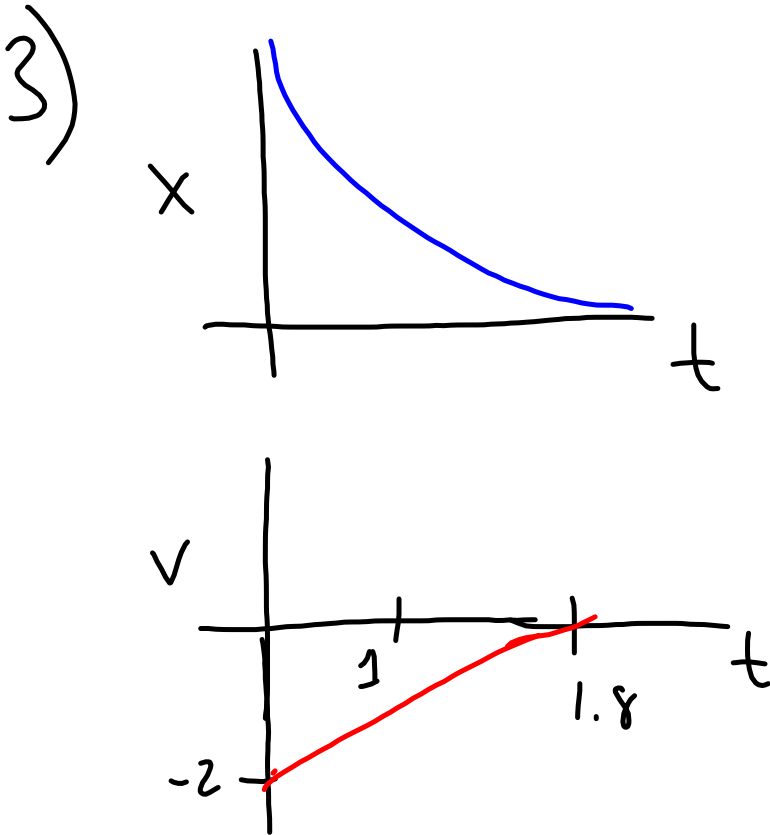


Constant positive
velocity



2)





b. slowing down

$$c. \quad a = \frac{\Delta v}{\Delta t} = \frac{v_f - v_i}{t_f - t_i} = \frac{0 \text{ m/s} - (-2 \text{ m/s})}{1.8 \text{ s} - 0 \text{ s}}$$

$$= 1.11 \text{ m/s}^2$$

4) \vec{v} is vector \rightarrow two ways to change this

change the magnitude

OR

\Rightarrow accelerating

change the direction

5) $F_1 = \frac{k q_1 q_2}{r_1^2} = 0.08 \text{ N}$ 1 \rightarrow original
2 \rightarrow new

$$F_2 = \frac{k q_1 q_2}{r_2^2} = \frac{k q_1 q_2}{(3r_1)^2} = \frac{k q_1 q_2}{9 r_1^2}$$

$$= \left(\frac{1}{9}\right) F_1 = \left(\frac{1}{9}\right) (0.08 \text{ N})$$

$$= 0.0089 \text{ N}$$