Exercise 3 Hint

Let $H(n)$ be the Hailstone function (i.e. $H(n)$ is either $n/2$ or $3n+1$). Then, provided $n > 1$, the Hailstone sequence of n is given by n followed by the Hailstone sequence of $H(n)$.

If you code it recursively, remember to use `option remember`.

If `L` is a list, then `max(op(L))` will give you the maximum entry in the list.

For the mathematical question: suppose n is odd. What will the first three terms in its Hailstone sequence be? What points does that mean you'll be plotting? What if n is even?