

**Definition 3.248.** [2DF] Recall that a set is "countably infinite" if it has the same cardinality of  $\mathbb{N}$ .

If  $A$  is countably infinite, there exists  $a : \mathbb{N} \rightarrow A$  bijective. Writing  $a_n$  instead of  $a(n)$ , we will therefore say that  $A = \{a_0, a_1, a_2 \dots\}$  is an **enumeration**.