

# Event-B conventions

- *partition* is a shorthand definition of a set that can be partitioned into separate, disjoint parts (subsets)
- If the parts (subsets) are singleton sets, e.g., of the form  $\{element\}$ , such a definition defines of an enumerated set
- For instance,  $partition(Set, \{element1\}, \{element2\}, \{element3\})$  is a shorthand for the axioms
  - $element1 \in Set$ ,
  - $element2 \in Set$ ,
  - $element3 \in Set$ ,
  - $element1 \neq element2$ ,
  - $element1 \neq element3$ ,
  - $element2 \neq element3$ ,
  - $Set = \{element1, element2, element3\}$ .
- In general, any disjoint subsets instead of  $\{element\}$ , e.g.,  $partition(ITEM, Available, Sold)$