

Summary of notation for specifications (date: 21-9-2020)

```
spec nameSpecification
[ use specification1, specification2, ... ]
[ formal parameter
  sort nameSort
  [ operation
    [partial] [ _ ] nameOperation [ _ ] : [ domain ] → range
    {Description of the domain and range of the operation and, where appropriate, of the
    situations that make the operation being partial}
    ....
  ]
end_fp ]
sort nameSort {description of the domain of values of the ADT}
operations

[partial] nameOperation: [ domain ] → range
{Description of the domain and range of the operation.
 [Partial: description of the situations that make the operation being partial]}
...
[partial] nameOperation _ : domainSort domainName → range
{Description of the domain and range of the operation.
 [Partial: description of the situations that make the operation being partial]}
...
[partial] _ nameOperation _ :
  domainSort1 domainName1, domainSort2 domainName2 → range
{Description of the domain and range of the operation.
 [Partial: description of the situations that make the operation being partial]}
...
...
end_spec
```

Where:

[] It means that what is between the brackets is optional, it may or may not appear.

Domain is a list of elements separated by ‘,’ and where each element describes a parameter of the operation, indicating the sort and name of the parameter.

Range is the name of a sort.

The symbol ‘_’ indicates the position of the arguments with respect to the name of the operation. It is used to indicate operations with prefix notation without parentheses or with infix notation (for instance: $\neg_ , _ \leq _$).