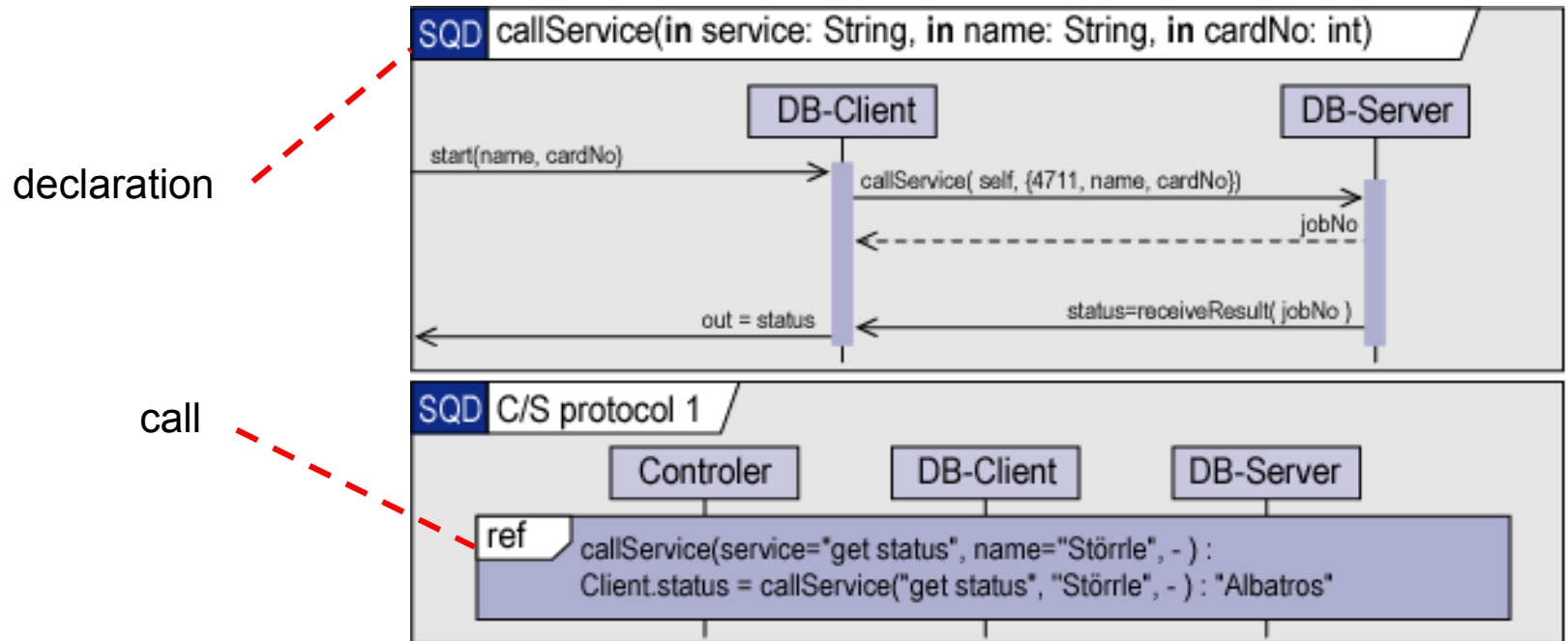


Interaction operator ref & parameters

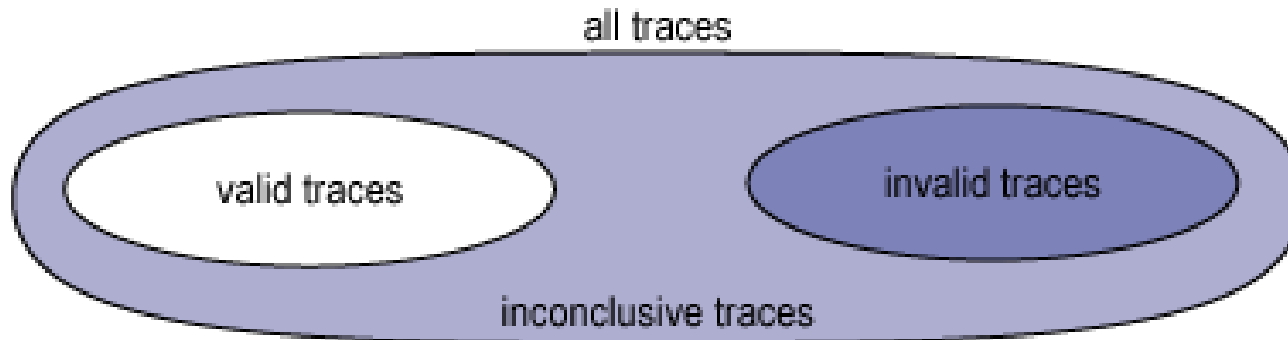
- **ref**
 - refers to a fragment defined elsewhere (macro-expansion)
 - Formal and actual parameters (bindings) are declared in the diagram head.



- Signals to the containing classifier appear as arrows from the diagram border.

Interaction operators: negation

- The semantics of neg and assert is unclear.
- In contrast to that the other operators, they refer not just to the positive traces, but to invalid and inconclusive traces as well.



- **neg**
 - declare all valid traces as invalid
 - inconclusive traces: unknown
- **assert**
 - remove uncertainty by declaring all inconclusive traces as invalid

Wrap up

- Complex interactions **like high-level MSCs** added.
- New diagram types:
 - timing diagrams (like oscilloscope), and
 - interaction overview (similar to restricted activity diagram)
 - renamed collaboration diagram to communication diagram
- Completely **new metamodel**.
- Almost formal three-valued semantics of valid, invalid and inconclusive interleaving traces of events.
- Some semantical problems are yet to be solved.