Use Case 1
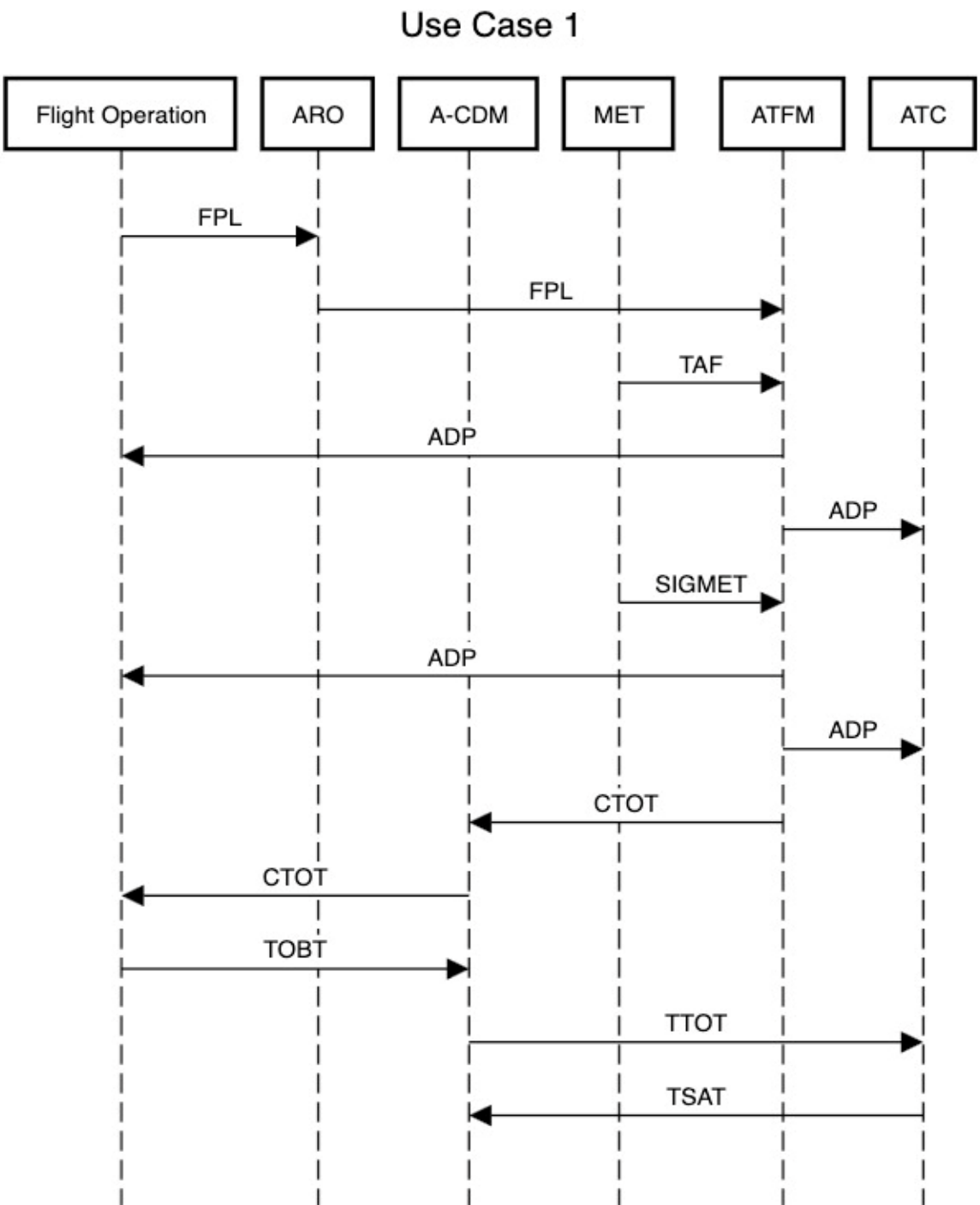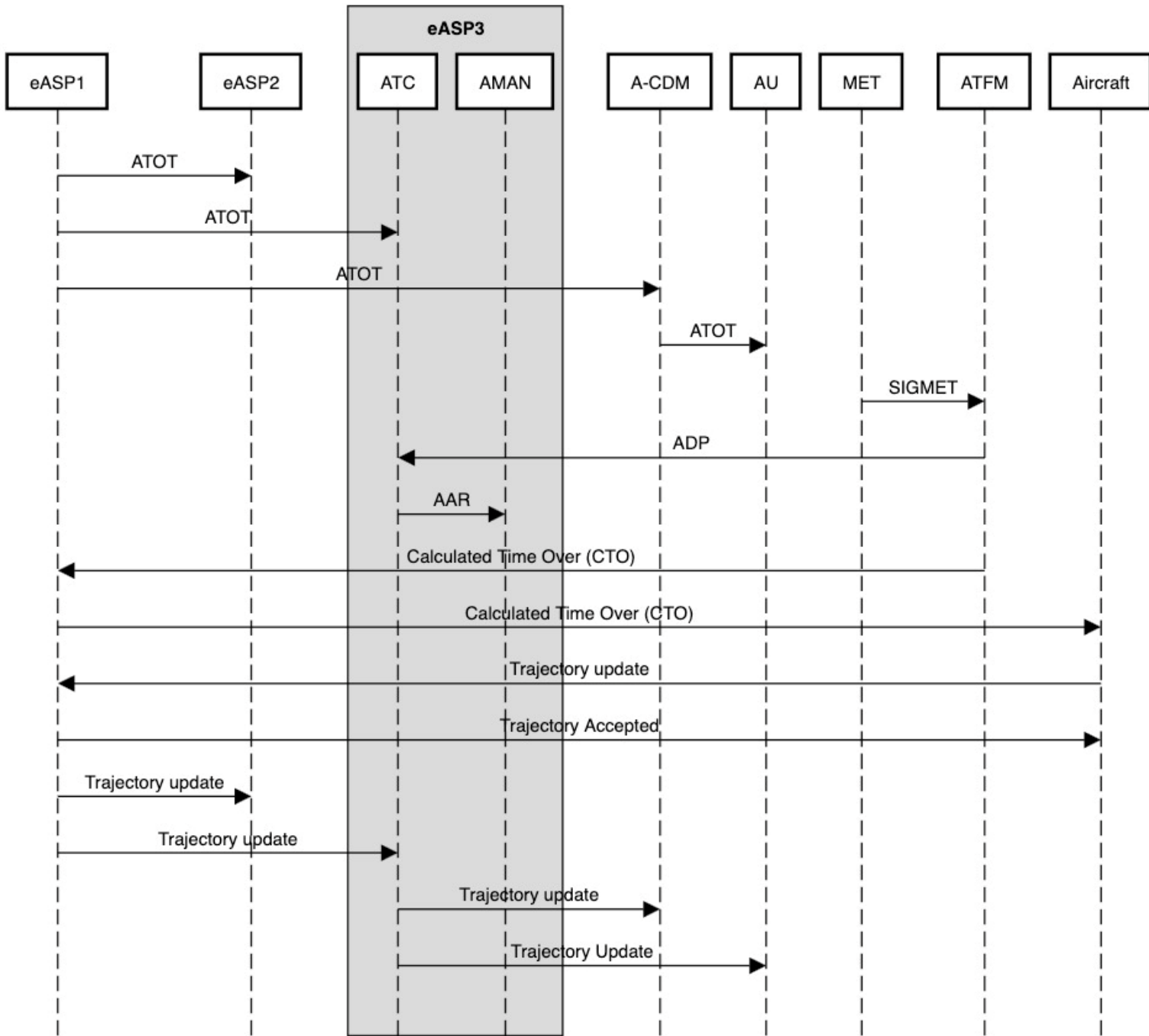
USE CASE 1
PRE-DEPARTURE
DISRUPTION

USE CASE 2
IN FLIGHT DISRUPTION

Prepared Messages to be Used in Solace

USE CASE 1

SIGMET
Topic: Jakarta/1/MET/WI_CAI/0/MET/SIGMET

```
{
    "phenomenon": "Thunderstorm",
    "airspace": "Jakarta FIR",
    "begin": "2024-11-05T10:11:00Z",
    "end": "2024-11-05T13:30:00Z",
    "geometry": {
        "upperlimit": "FL530",
        "coordinate": "2.83 99.82 -1.62 102.15 -4.17 101.63 2.07 97.7 2.83 99.82"
    },
   "direction": "270",
   "speed": "10"
}
```

FPL
Topic: Jakarta/1/ANSP/WI_CAI/0/FLIGHT/SUBMIT_FILED_FLIGHT_PLAN

```
{
    "acid": 885103,
    "type": "A359",
    "registration": "HSTHC",
    "ident": "THA433",
    "gufi": "f62427f6-108b-4c15-ac10-fabcd6d517f6"
    "departure": "VTBS",
    "destination": "WIII",
    "route": "KIGOB Y11 PASVA Y514 NUFFA DCT BIKTA B469 VMR B338 ANITO B470
BUNIK"
```

* More/complete message will be provided as required

SWIM In Our Understanding

SWIM Technical Infrastructure

- It is a key component of the SWIM layers.
- It includes the network, data centers, security mechanisms, and enterprise messaging services (EMS).
- It provides the foundation to host SWIM Information Services and support SWIM Information Consumers.
- It ensures secure, reliable, and efficient data exchange across aviation stakeholders.
- It facilitates the seamless sharing of real-time information, such as flight, weather, and air traffic data.

SWIM Information Service

- A system or a piece of software that able to provide certain information within SWIM Environment using the defined SWIM data model

- SWIM Information Service is using SWIM Technical Infrastructure.

- The information provided is consumed by SWIM information consumer under agreed circumstance and method (PUB/SUB or REQ/RES)

Our Next Steps

- Build SWIM Implementation Roadmap
- Build the requirements
- Prepare the infrastructure
- Develop (~~or buy~~) the SWIM Services
  - Test, verify, validate
  - Internal Trial
  - Domestic Trial
  - Regional Trial
- Integrate to other SWIM Service, or other supporting system

Gap - How can SWIM TF Help Better

Gap:

o Not all aviation stakeholders are fully aware of what SWIM is, its capabilities, and the potential benefits it brings to air traffic management.

o Some stakeholders may lack the technical expertise required to understand, implement, operate, and maintain SWIM systems effectively.

o Some stakeholders prefer to wait and see until SWIM is settled and solutions is available on the market.

o (Probably) There are some worries of transparent operation process that may impact current operations.

For SWIM TF:

• Finalize the standards/manual

• Provide technical advisors for states

• Encourage other stakeholders (AO and AU) to join the party

• Make/convince the decision makers to buy-in or even all-in to implement SWIM