



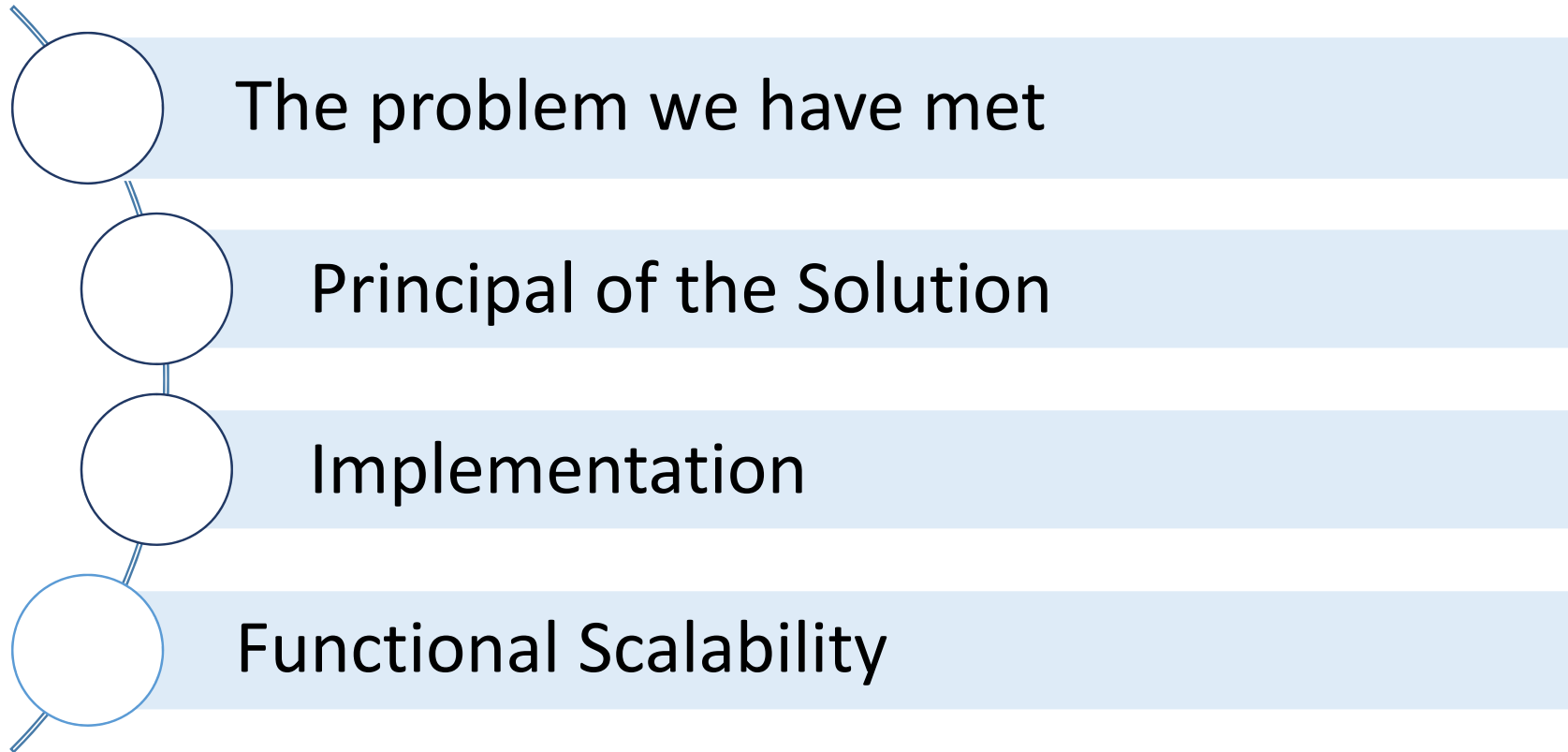
Management of SCA-based Radio Systems with the PlatformManager Component

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Outline



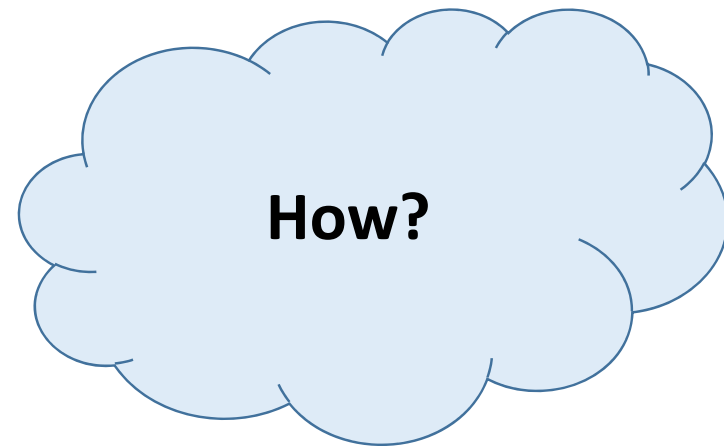
Problem

In software radio systems

- More and more hardware and software resources need to be managed.
- More and more functional requirements of dynamic control, such as configure, query, reconfiguration.
- Diversification of communication protocols with host.

Other factors

- The SCA specification itself does not clearly stipulate platform management.
- The external host software is not required to be an SCA-compliant component.



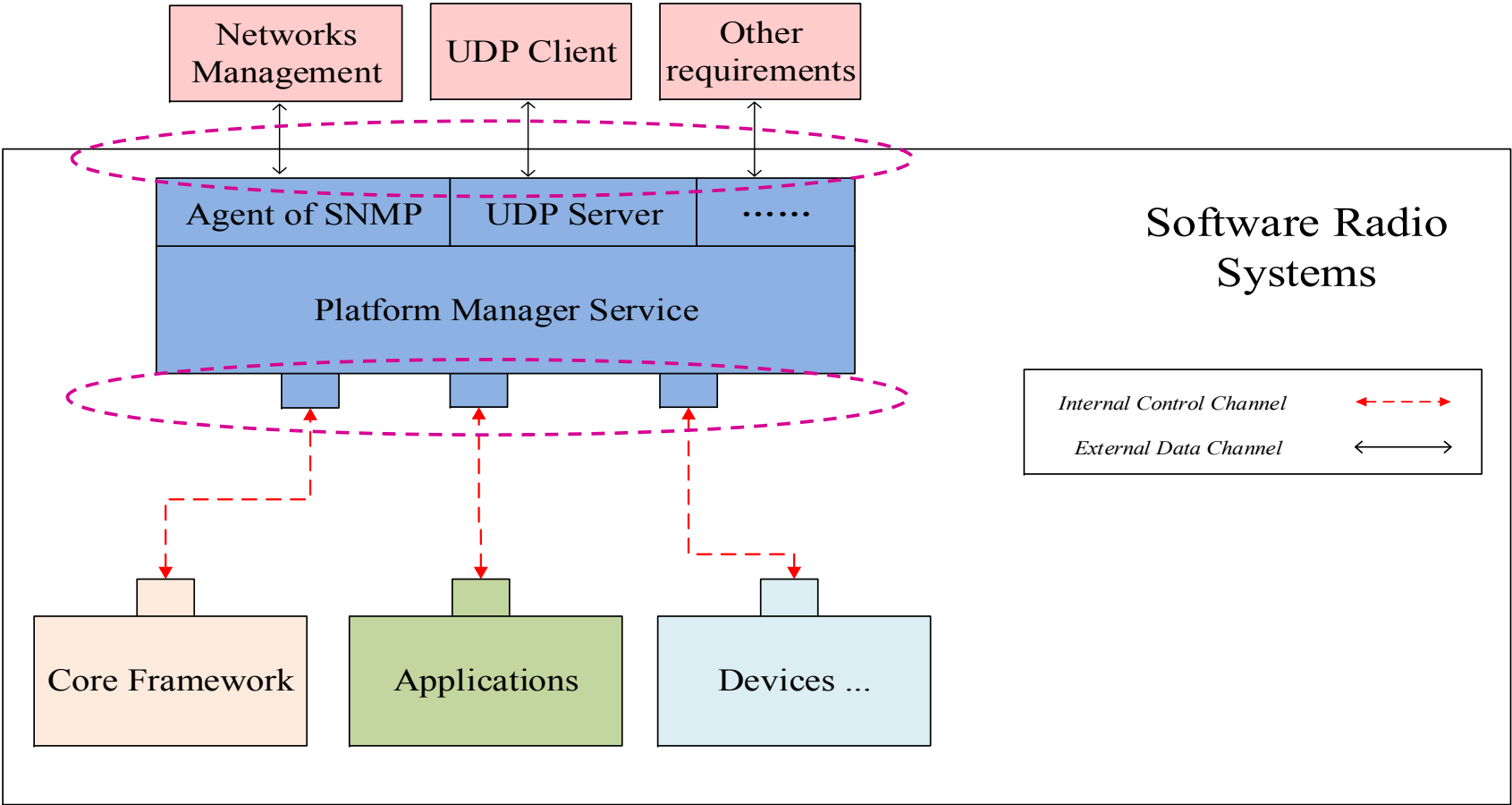
Problem

How to manage and operate such systems conveniently, and how to transplant applications flexibly have become a problem to be solved urgently in reality.

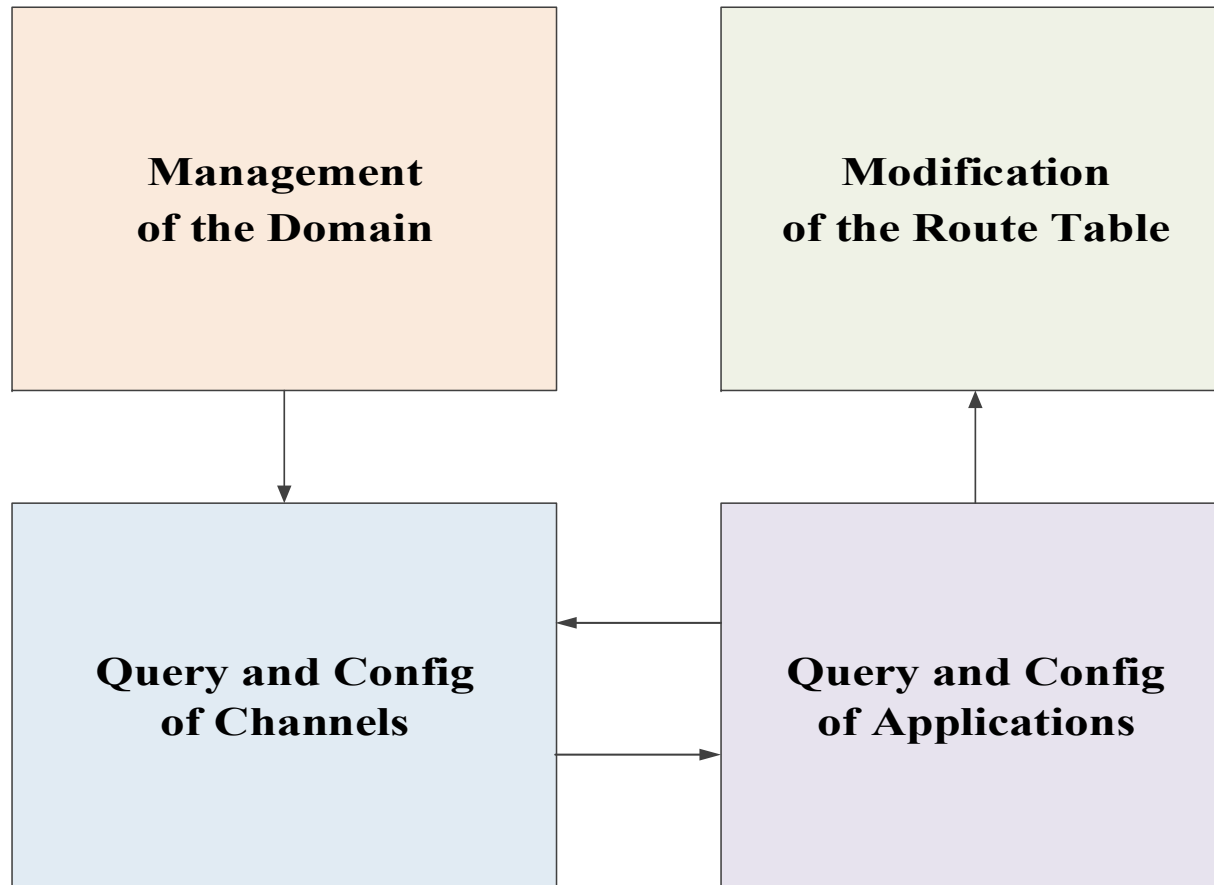
Principal of the Solution

- No matter how we solve this problem, the premise is that the platform management function must be a SCA-compliant component.
- Considering that the device-related characteristics of the platform management function, we tend to design it as a device component, which locates in the software radio system as a service.

PlatformManager Service(PMS)



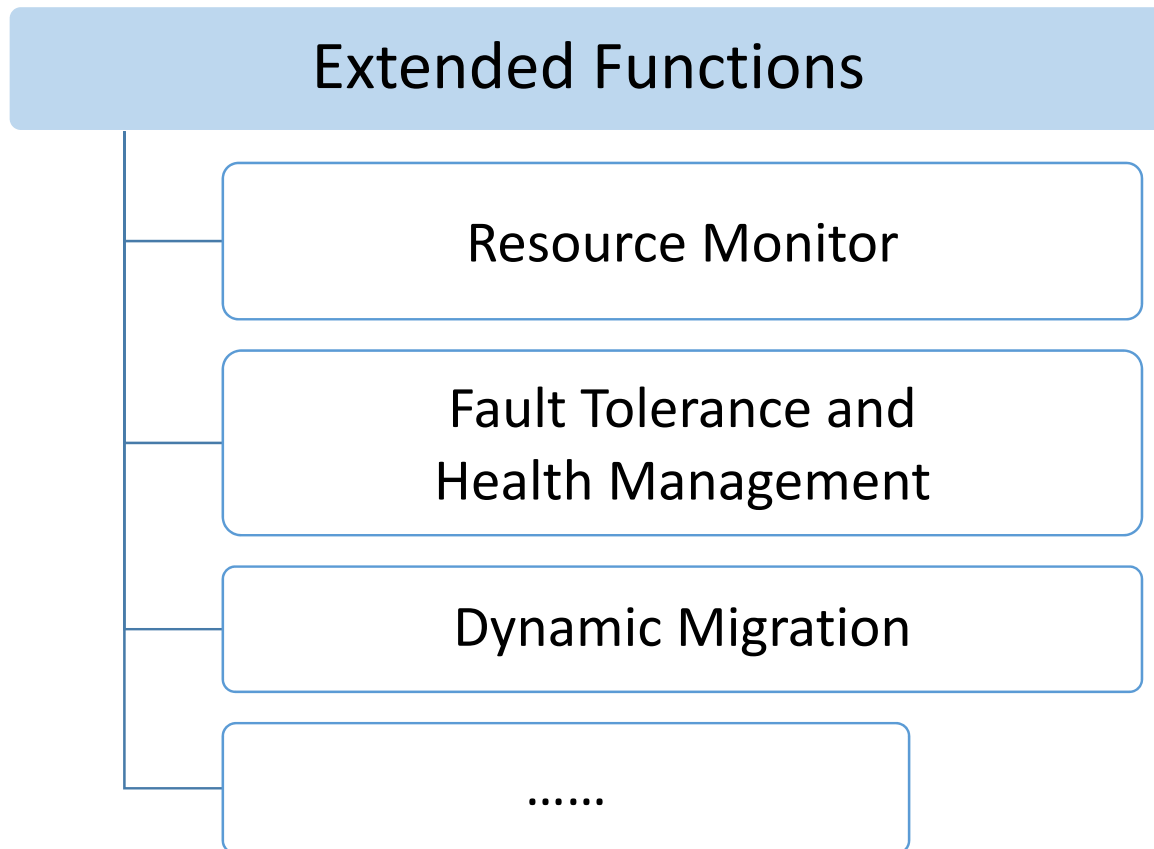
Primary Functions of the current PMS



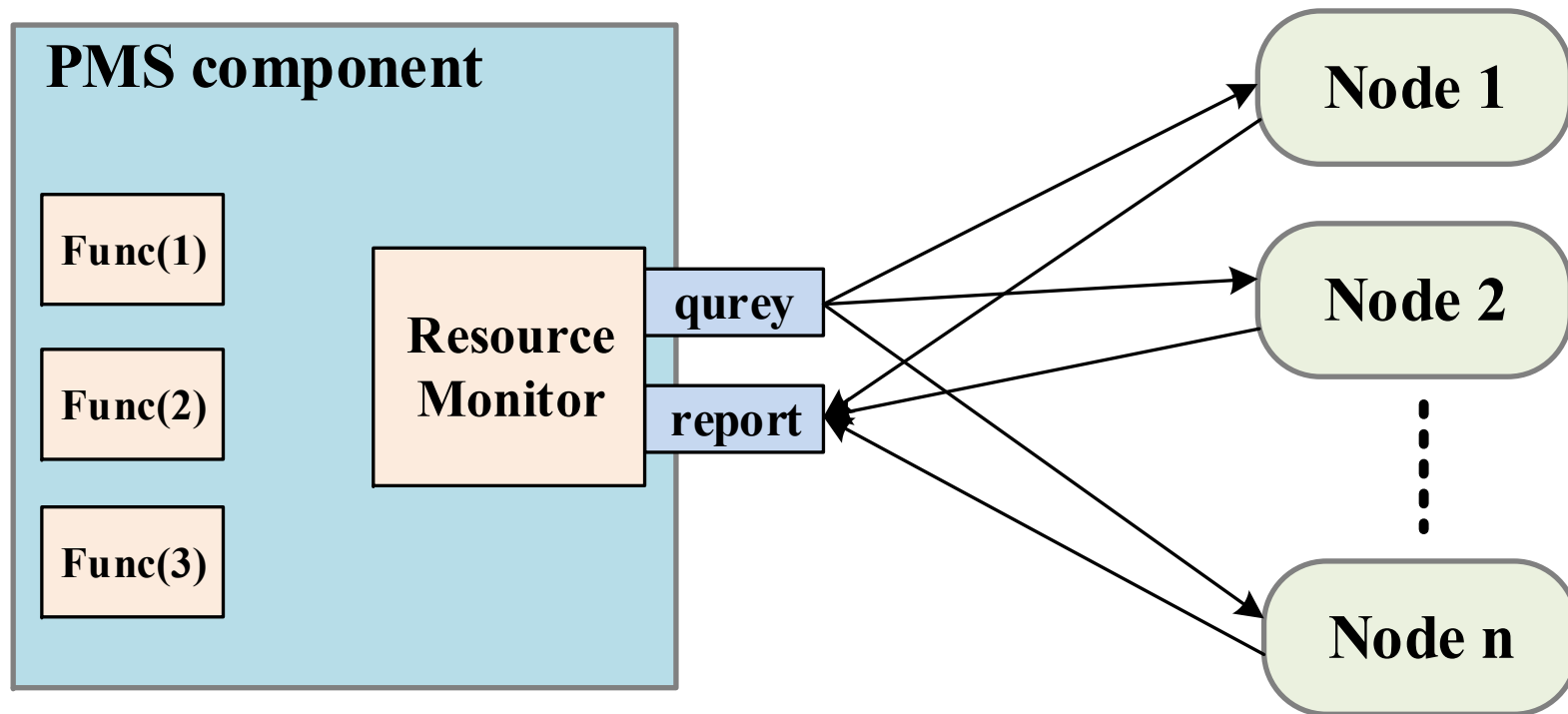
Effects of the Solution

- Provide a general management style for SCA-based platform.
- Able to monitor and control all registered components in the domain.
- Fully compliant with SCA specifications
- Working in GPPs, with excellent portability.

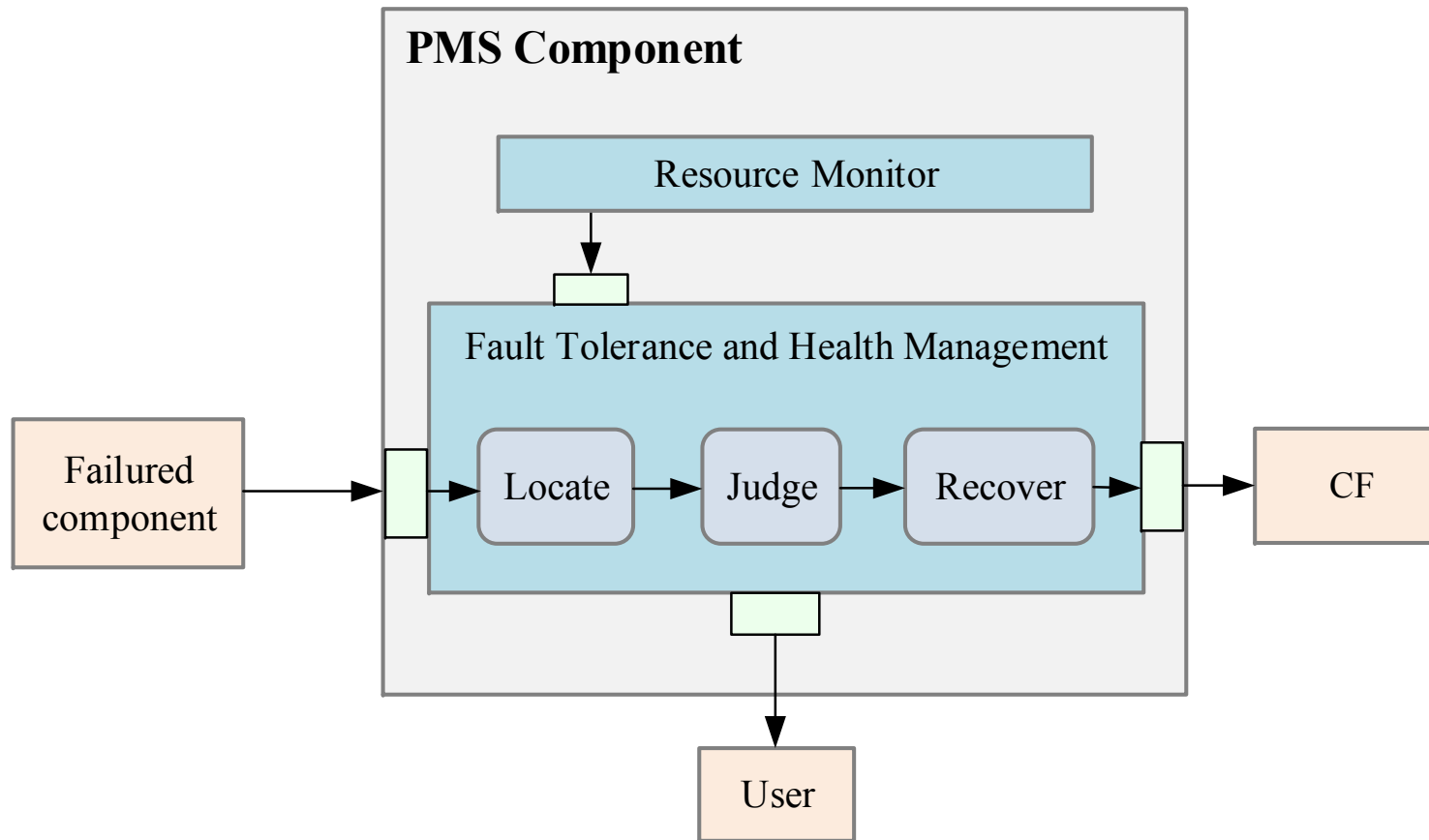
Functional Scalability



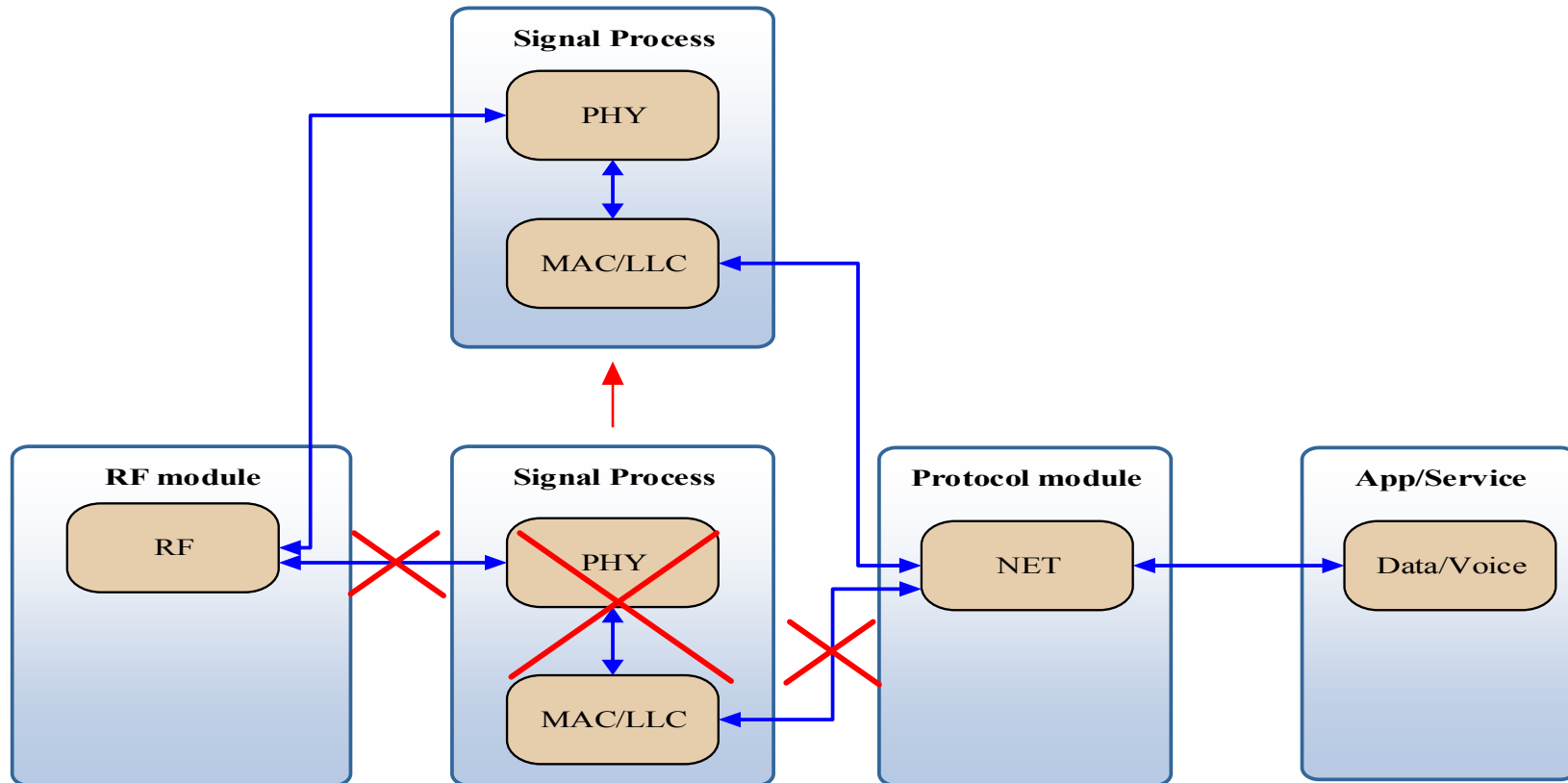
Resource Monitor



Fault Tolerance and Health Management



Dynamic Migration





Thank you.

Any question?

