

Consolidated Provisioning Problem Statement

draft-schwartz-peppermint-problem-statement-01

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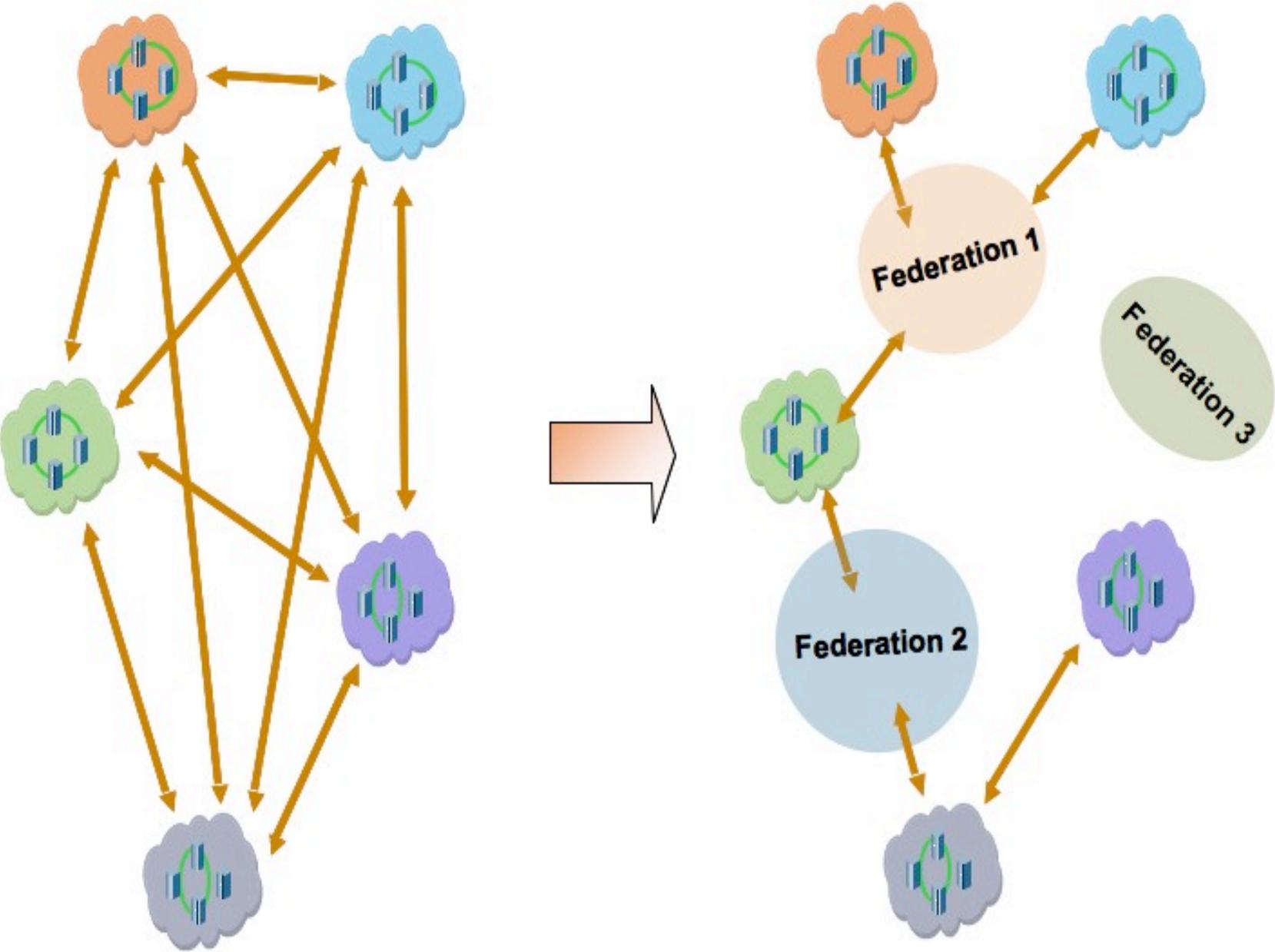
PEPPERMINT BOF

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Evolving Peering Relationships



Peppermint Background

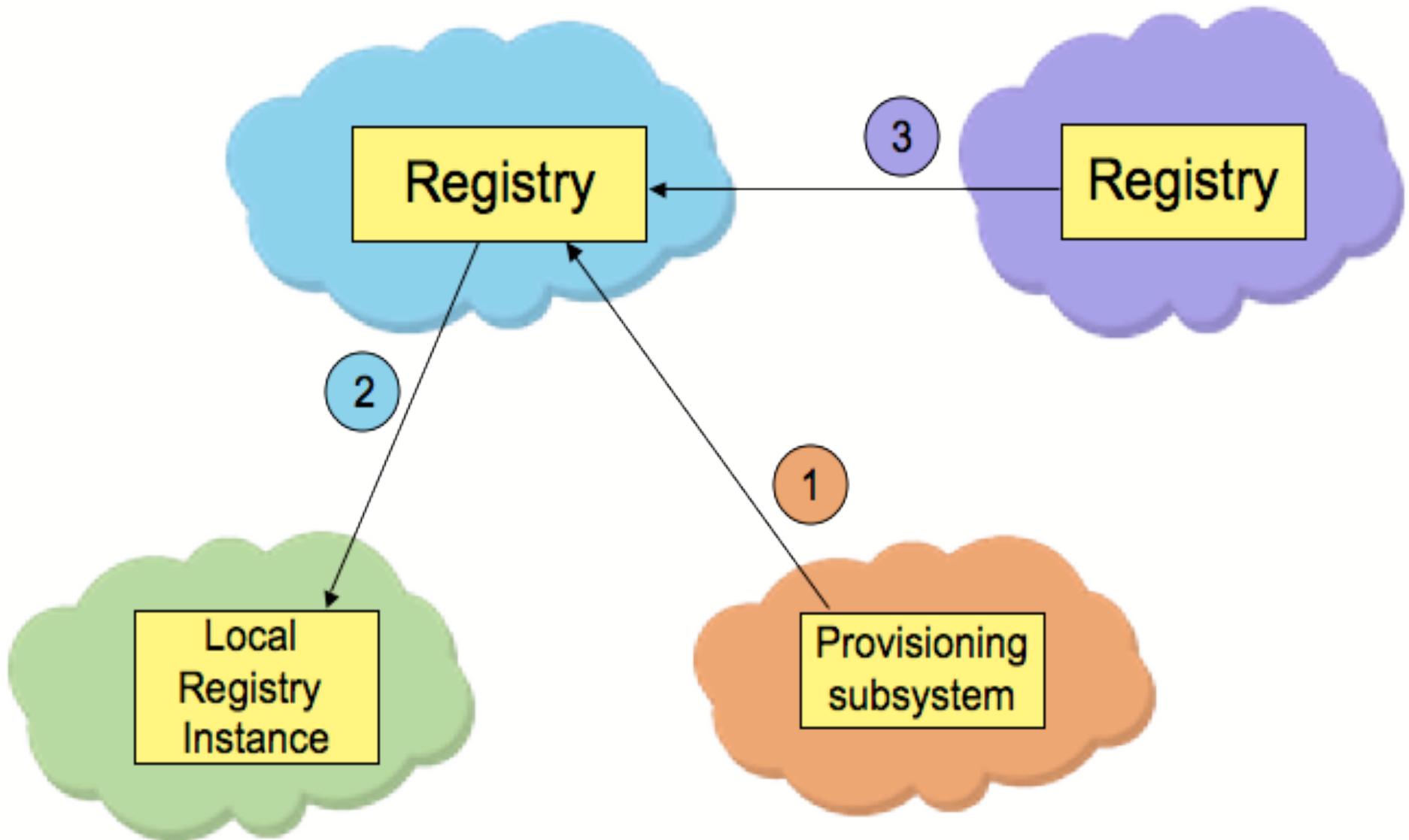
- Many peering registries are being formed today
- Standardization needed before proprietary solutions emerge
- Operators are asking for it (use > 1 registry, avoid lock in)
- Large consortiums
 - e.g. Cablelabs, GSMA, National LNP/CDB-UK
- Multiple in country (Non LNP) registries

Peppermint Problem Statement

The PEPPERMINT working group is chartered to define what data needs to be exchanged within and among Multimedia administrative domains (outside the normal scope of establishing various forms of a SIP session) and how that data should be structured provisioned and propagated.

It's all about the exchange of data

Provisioning Interfaces



Registry Data

- Index/Key Data

- Prefixes

- Variable length
 - Private/public
 - Sub/super/overlapping

- Resolution Data

- “Ownership” not reachability

- Multiple “owners” possible hence multiple data sets

- LNP considerations

- NAPTR compatibility and general future-proofing

- Bulk exchange considerations

Logical Operations On Registry Data

- **Add** – Add (responsible VSP) data about a new prefix to the registry
- **Delete** – Remove prefix as it no longer exists anywhere
- **Port-Out** – Prefix exists but previous owner no longer responsible for it
- **Port-In** – Prefix existed before and is now being assigned to new owner
- **Transfer** – Port-Out followed by Port-in (reduce “failure” time)
- **Renumber** – Prefix changed but associated data remains the same
- **Modify** – Some other attribute of prefix modified (e.g. target URI)

Other Registry Attributes

- **Validity** – DateTime window within which prefix is addressable
 - Needed for port-in and port-out capability
- **Number Type** – Unknown, IP, PSTN, both
- **PSTN carrier code** – numbers with no IP reachability
- **Fee Category** – free, landline, mobile, pay
- **Media Type** – voice, video, message

Protocols (In alphabetical order)

- AXFR/IXFR
- EPP
- Excel/FTP
- Excel/SMTP
- HTTPS
- SOAP/XML
- ESPP