

some ideas about

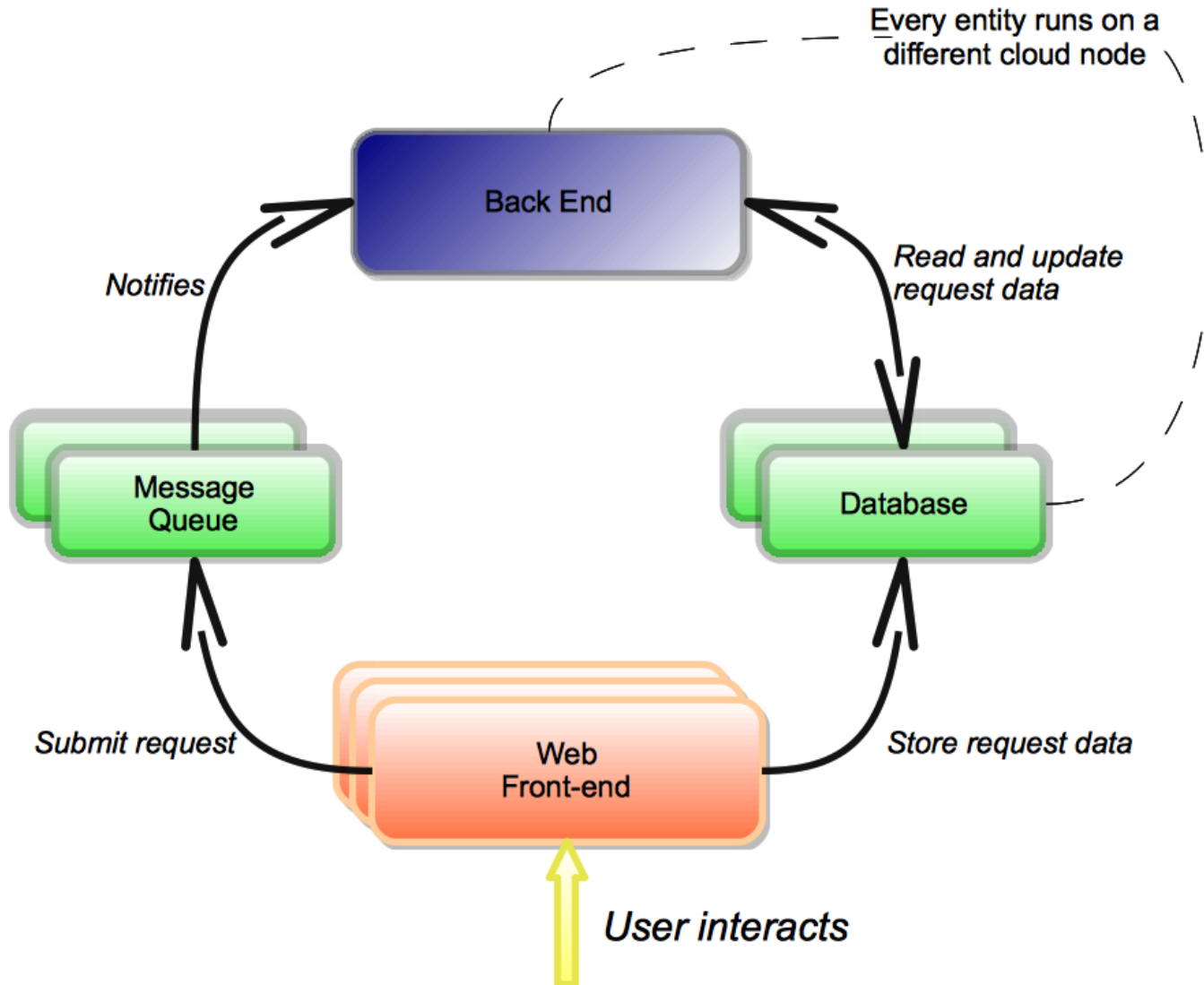
OSGi and Discovery in the Cloud

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An example Cloud-based application

- Made up of a number of (replicated) entities
- Possibly a number of different VM images
 - defining each entity
 - configured/wired up during deployment
 - possibly using elastic IP addresses or similar
 - or via a deployment script that plugs in configuration

The example application



OSGi Approach (provisioning)

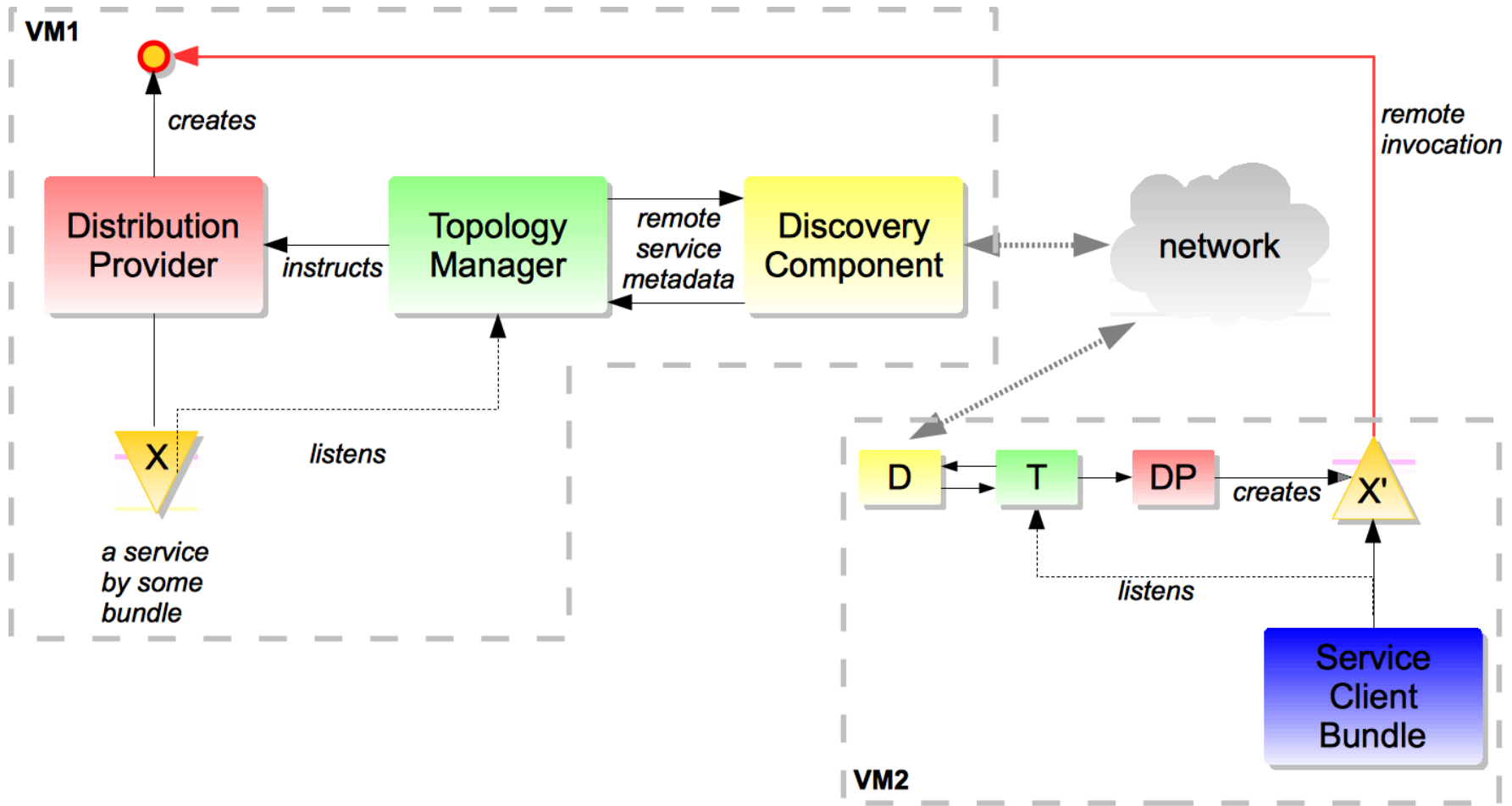
- Minimal, uniform VM image
 - Provides bare OSGi Framework baseline
 - Dynamically provisioned based on the role to be played
 - Use OSGi Enterprise R5 Repository and Resolver
 - Can be dynamically repurposed
 - without the need to redeploy the VM image
 - Highly flexible
 - Saves bandwidth
 - Paremus will demo shortly

OSGi Approach (discovery)

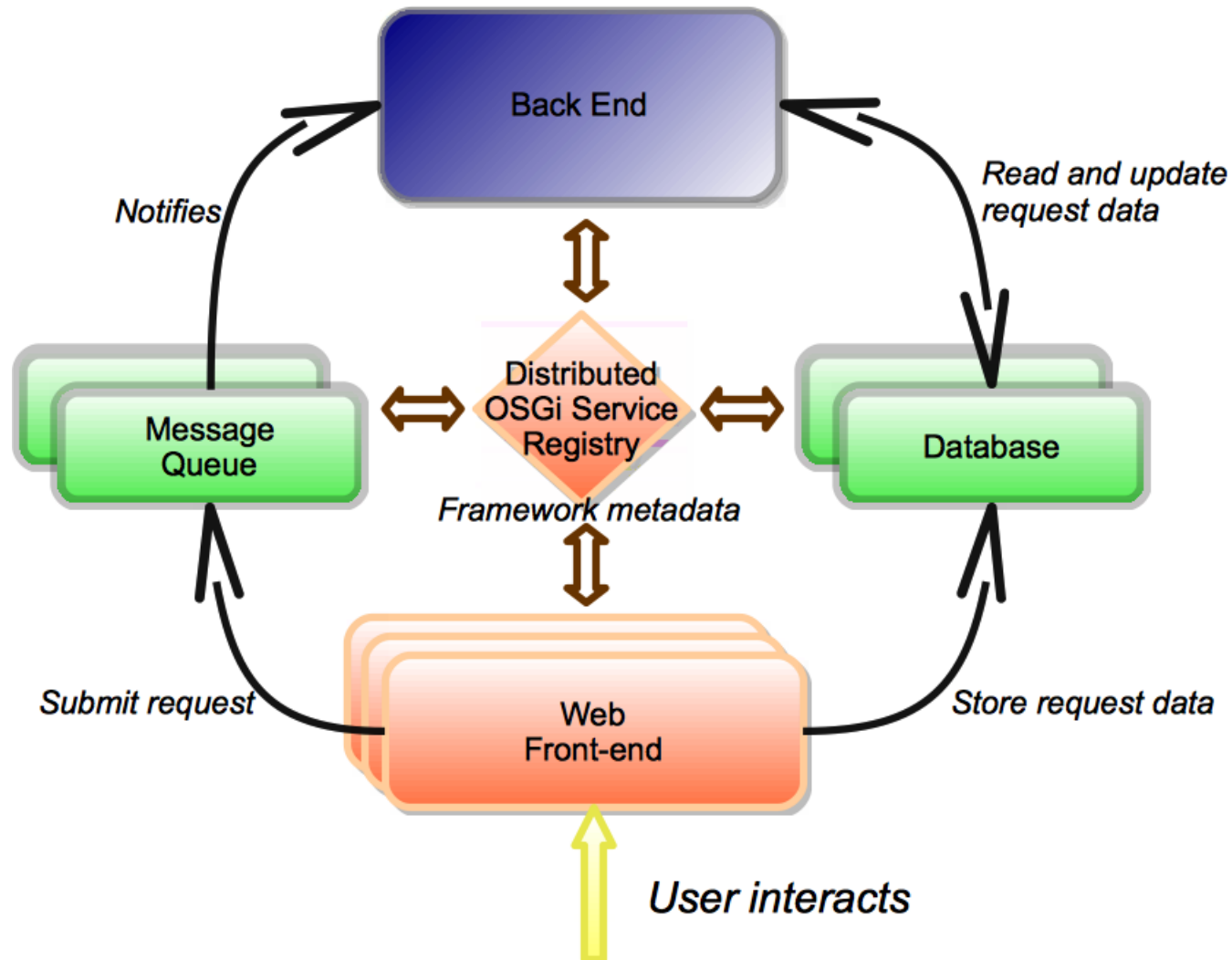
- Use the dynamics of OSGi to do the wiring up of the entities in the cloud
- System becomes self-organizing
- Entities can be added/replaced
 - client entities will automatically reconfigure themselves
- No need for cloud-specific solutions

OSGi Remote Services

the Service Registry, Distributed



A possible OSGi Discovery solution



What next?

- Previous slide was just one way of solving the problem
 - Other approaches are possible and will be discussed as part of the RFC-phase
- OSGi building blocks fit the problem quite well
- Work out the technical design, RFC and spec in the EEG
 - Interested? join in!
 - Contact david@redhat.com or look at www.osgi.org