



Simplifying Configuration

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Why?

- EMI is about to end
- With it... YAIM support becomes even harder
 - It was never easy...
- But it's still (by far) the number one option
 - Especially at smaller setups, but also in larger ones
 - Mostly (I think) because we don't provide an easy solution for a non-centrally managed configuration
- We should look now at our options for the future
 - And take the chance to improve the process as we're on it?





What we need?

- Large setups will never be a problem
 - They will keep their own configuration solution
 - They have the knowledge... and share it (see Quattor)
- Smaller sites need our help
 - Harder to have a centralized solution
 - Per machine configuration probably a better option
 - Setup / maintenance of DPM a *part time* effort
 - Learning new config management tools not an option





Possibility 1: Keep YAİM

- YAİM is based on a set of bash scripts
- Takes care of all the functionality we need
 - Basic grid setup (CAs, mkgridmap, ...)
 - External dependencies (VOMS clients, BDII, ...)
 - Specific functions for DPM components
- Not declarative
 - We do not declare a state for the machine... we define functions to be run and entry parameters
 - Works fine for a clean setup... but many surprises later
- Can we keep it?
 - As long as the external functions are not touched...
 - Anyone taking responsibility for those?



Possibility 2: Replace YAİM

- Can we simply forget about YAİM?
 - If we provide an alternative?
- Many options out there, some popular in WLCG sites
 - Quattor, Puppet at least
 - Means we don't have to write the *basic setup* part
- Valid solution?
 - Would need to be declarative (otherwise not much gained)
 - Can small sites move to a completely different solution?



Possibility 2: Wrap YAIM

- In theory... the best of both worlds
- We expose the existing YAIM variables
 - Underneath we generate the templates/manifests for the configuration solution we have chosen
 - And run that tool instead
- What is needed
 - Developing a single YAIM function taking care of the conversion (not very hard)
 - Testing the solution (some additional work)
- This would leave more time for sites to start using that tool directly



- We will demo Puppet management tomorrow
- Shall we try possibility 2 with Puppet?
 - Puppet can be run locally, no need for a central instance
 - Puppet has a large and very active user base
 - Lots of documentation
 - CERN is moving to it... and the list of *free* modules we can get is already very impressive (look for *punch*)
 - Maintenance would be guaranteed
- We need a volunteer site for the testing and validation