

# CADEC 2011

Senaste nytt från QCon 2010

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# QCON 2010 SF

- 1st week in November 2010
- 2 days tutorials
- 3 days conference
  
- Halloween
- Go GIANTS!
- Anchorsteam...



# Agenda

Trends according to me...

- Scaling – How to handle many users?
- Agile Development – What is the state today?
  - What have we learned?
- Cooperation between Dev & Ops
  - “New” way of solving problems
- Other
  - Meta-architecture
  - Node.js



# I should not talk about this!

- New languages – Clojure, Erlang, Groovy, Ruby, ...
- RESTful SOA
- Pretotyping
- Brownfield software
- Actor thinking
- Semantic web
- Personal retrospective
- NoSQL



# Scaling, stories from reality

- Twitter – Tweets, Timelines and Social graphs
- eBay – more than 220 million items on sale...
- Google – 5000 developers, 2000 projects ...
- Netflix – 16 millions Internet subscribers to movies and TV shows...
- Visa - 130 million transactions each day in 200 countries...
- Facebook – reaches 500 million people each month...
- ...



# Agile, retrospective

- Agile has matured, how does it work in reality? Is it effective?
  - Agile with Kanban and Lean
  - Big Ball of Mud
  - Continuous Deployment to production
  - Keeping Agile Agile
  - Agile Does Not guarantee Value creation
  - ...



# Agile with Kanban and Lean

- Agile antipatterns
  - Breakdown madness, Sprinting to meaningless deadlines, Cargo Cult batch sizes (2-4 veckor), Sub optimization, Synchronizing everything, Too much work in progress, ...
- "Solution"
  - Lean principles
    - » Identify value from the customer's perspective, ...
  - Kanban principles
    - » Limit work in progress, Quality built in, ...



# Agile and Big Ball of Mud (BBoM)

- A BIG BALL OF MUD is haphazardly structured, sprawling, sloppy, duct-tape and bailing wire, spaghetti code jungle.
- It is the de-facto standard software architecture.
- Why is the gap between what we **preach and** what we **practice so large?**
- People write code == People make mud
- Keep it working!
- Agile to the rescue!?





# Development & Operations – Cooperation

- Much to gain by bringing Development and Operations together. Make them understand each other!
  - Continuous Delivery
    - » Ask yourself:
      - How much time does it take your new line of code to meet the customer?
  - Dev & Op cooperation when the worst happens...
    - » When the Fur Flies: Dev and Ops Cooperation when the Worst Happens



# Design at scale – Meta-architecture

- Building a system that can be extended and adapted without a programmer's intervention?
  - Architectures that can dynamically adapt to changing requirements are sometimes called reflective or meta-architectures. We call a particular kind of reflective architecture an Adaptive Object-Model (AOM)
  - An AOM is a system that represents classes, attributes, relationships and behavior as metadata. It is a model based on instances rather than classes.



# Node.js

- Node.js is a set of bindings to the V8 javascript VM.
- Allows one to script programs that do non-blocking I/O in javascript.
- Sample of a simple HTTP server

```
http = require('http');  
s = http.Server(function (req, res) {  
  res.writeHead(200);  
  res.end('hello world\n');  
});  
  
// Listen on port 8000  
s.listen(8000);
```



# Links and presentations!

- QCON SF: <http://qconsf.com>
  - Track: Architectures you've always wondered about
  - Raising the bar: Using Kanban and Lean to super optimize your Agile implementation
  - Big Ball of Mud: Is This the Best that Agile can Do?
  - Continuous Delivery Presentation
  - When the Fur Flies: Dev and Ops Cooperation when the Worst Happens
  - When should you consider meta-architectures?
    - <http://adaptiveobjectmodel.com/>
  - Node.js: Asynchronous Purity Leads to Faster Development
- QCON London, 7-11 Mars 2011 : <http://qconlondon.com/>

