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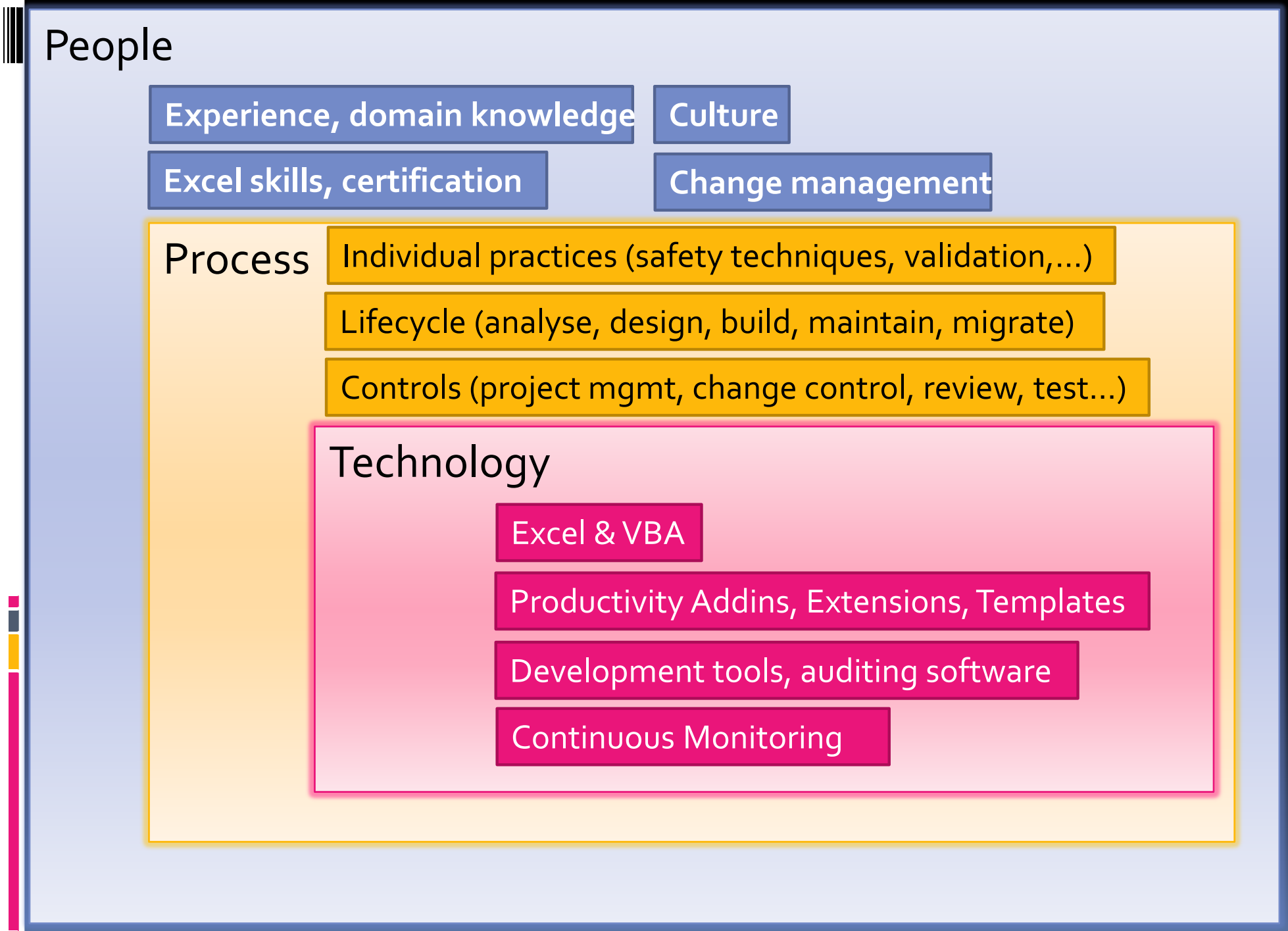
# THE SPREADSHEET PROBLEM IS SOLVED … ISN'T IT?

# Agenda

- Process
  - Policy, Controls, Standards, Metrics
- People
  - Cultural change, Training
- Technology
  - Tools
- Open forum


People
Experience, domain knowledge
Culture
Excel skills, certification
Change management
Process
Individual practices (safety techniques, validation,…)
Lifecycle (analyse, design, build, maintain, migrate)
Controls (project mgmt, change control, review, test…)
Technology
Excel & VBA
Productivity Addins, Extensions, Templates
Development tools, auditing software
Continuous Monitoring

# Change programme

- Awareness, Assessment
- EUC Policy and Standards
  - Scope, criticality, controls, external reqts
- Inventory – snapshot & dynamics
- Cultural change
  - Time, resources, priorities, responsibilities
- Gaps to be filled by remediation
  - Temporary resources, training
- Tools aligned with the process

# Finding errors

- IIA GTAG-14 Auditing User-developed Applications
- Business criticality & risk
- Static (structural) testing
- Dynamic (execution) testing
- Process review
- Reconciliation

# Fixing errors

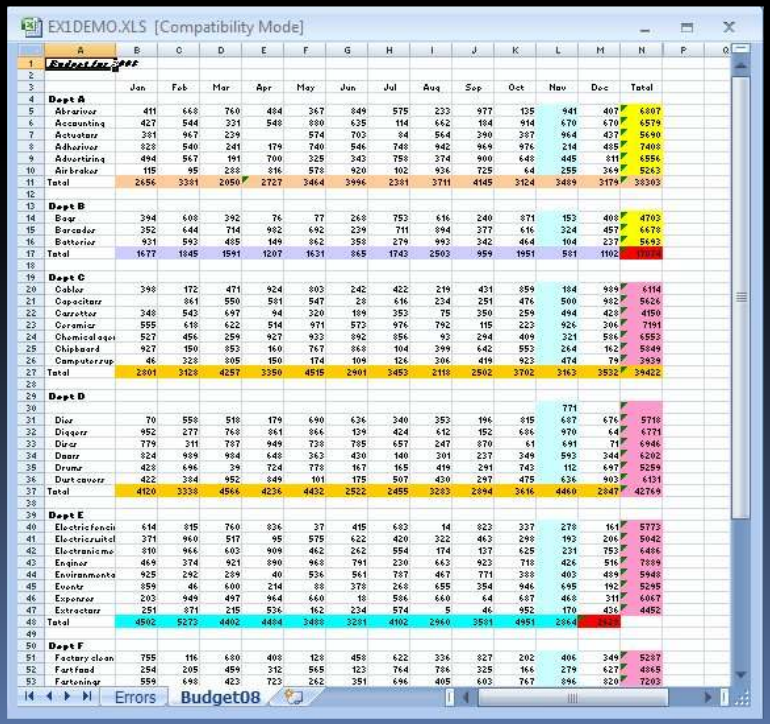
- Fix the product (remediation)
- Fix the process (is there a better way?)
- Standard COBIT
  - The easy controls that everyone accepts
    - Versions, Backup, Access, Archiving
  - The hard work controls
    - Segregation, Change approval, testing, documentation

# Software tools

- ClusterSeven (CCTV for ss)
- CIMCON XAudit (assessment, control)
- Prodiance (bought by MS)
- Lyquidity ComplyXL (change monitor)
- ScanXLS (Inventory, Links)
- XLTest (audit, test)
- SpACE 3 & EXChecker (Finsbury)
- Spreadsheet Detective
- Spreadsheet Professional
- Operis Analysis Kit
- Rainbow Analyst
- Navigator Utilities
- Incisive Xcellerator
- Spreadsheet Studio
- BPM Traverse
- Explode
- ActiveData data analysis
- TM-VBA Inspector
- ...many more

# Free addin for attendees

- Just does one thing - formula highlighting
- http://www.sysmod.com/xltest_colorizer.zip
- Zip contains user manual, license, and addins for both 2003 (.xla) and 2007/10 (.xlam) versions of Excel™



# Craftmanship

- Excel, VBA, extension technologies
- Spreadsheet Check & Control book
- Professional Excel Development book
- Spreadsheet Safe certification
- Practices put in place to avoid **** happening again.
- Effectiveness of these prescriptions ?
- Depends on context

# Lessons from SW Eng/QA

- Prof Ray Panko
  - Recommended Practices for Spreadsheet Testing
  - Sarbanes-Oxley: What About all the Spreadsheets?
  - Spreadsheet Errors: What We Know. What We Think We Can Do
- Overconfidence
- Cost of wasted effort ("dumb solutions")
- Measurement & management

# Capers Jones: Thirty Software Engineering Issues that have stayed constant for 30 years

4. Finding and fixing bugs is the most expensive software activity.

5. Creating paper documents is the second most expensive software activity.

6. Coding is the third most expensive software activity.

7. Meetings and discussions are the fourth most expensive activity.

8. Most forms of testing are less than 30% efficient in finding bugs.

9. Most forms of testing touch less than 50% of the code being tested.

10. There are more defects in requirements and design than in source code.

11. There are more defects in test cases than in the software itself.

14. About 15% of software defects are delivered to customers.

17. About 7% of all defect repairs will accidentally inject new defects.

22. The failure mode for most cost estimates is to be excessively optimistic.

29. Average defect repair rates are about 10 bugs or defects per month.

30. Programmers need about 10 days of annual training to stay current.

# Thank you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