Architecture-Driven Modernization
Platform SIG
KDM RFP
Mission

• Create specifications and promote industry consensus on modernization of existing applications
What are Existing Applications?

Existing application systems are defined as any production-enabled software, regardless of the platform it runs on, language it is written in, or length of time it has been in production. Existing application has entered the maintenance and evolution mode.
Architecture-Driven Modernization

• Process of understanding and evolving existing software assets for the purpose of
  – Software improvement
  – Modifications
  – Interoperability
  – Refactoring
  – Restructuring
  – Reuse
  – Porting
  – Migration
  – Translation into another language
  – Enterprise application integration
  – Service-oriented architecture

• Modernization starts where existing practices fail to deliver against business objectives
Goals

• The ultimate goal - Revitalization of Existing Applications
• Make existing applications more agile
• Leverage existing OMG modeling standards and the MDA initiative
• Consolidate best practices leading to successful modernization
Benefits

• Enable business agility by creating software agility
• Improve ROI in existing software
  – Improve productivity of software development
  – Reduce maintenance effort and cost
• Extending useful life of existing applications
Roadmap

• Modernization meta-models
  1. Knowledge discovery meta-model (KDM)
  2. Target models (both platform-specific and platform-independent)
  3. Source-to-Target mapping models, addressing various specific classes of transformations
     – May need to extend KDM for specific transformations
  4. Metrics extension to KDM
  5. Process model

• This will be achieved by issuing multiple RFPs
• Currently issuing Knowledge Discovery RFP
Knowledge discovery meta-model RFP

- This RFP solicits proposals for a meta-model for representing information related to existing software assets and their operational environments. The meta-model will represent the physical and logical assets at various levels of abstraction.

- This RFP recognizes the existence of OMG specifications that are related to architecture-driven modernization. The response to this RFP should utilize these specifications or indicate why they are inadequate.
Next steps

- Recommend issuing KDM RFP by ADTF
- Vote to issue KDM RFP by PTC
- Charter Architecture-Driven Modernization PSIG as a Task Force
ADM – Architecture-Driven Modernization