v1.4

Anypoint Platform Architecture: Application Networks

Introducing the course

Course prerequisites

- **Target audience**:
  - **Enterprise Architects and Solution Architects**, new to Anypoint Platform, API-led connectivity and the application network, but experienced in other integration approaches (e.g., SOA) and integration technologies/platforms
- Prior to attending this course:
  - Get an **overview of Anypoint Platform** and its constituent components
  - "Getting Started with Anypoint Platform"
  - "Anypoint Platform Development: Fundamentals"
  - "MuleSoft.U Development Fundamentals"
  - "API-Led Connectivity Workshop" by MuleSoft Presales upon request

Course goals

- **Direct** the emergence of an effective **application network** out of individual integration solutions following API-led connectivity, working **with all relevant stakeholders** on all levels of the organization
- **Create** credible **high-level architecture models** for integration solutions on Anypoint Platform such that functional and non-functional requirements are likely to be met and the principles of **API-led connectivity** and application networks are followed

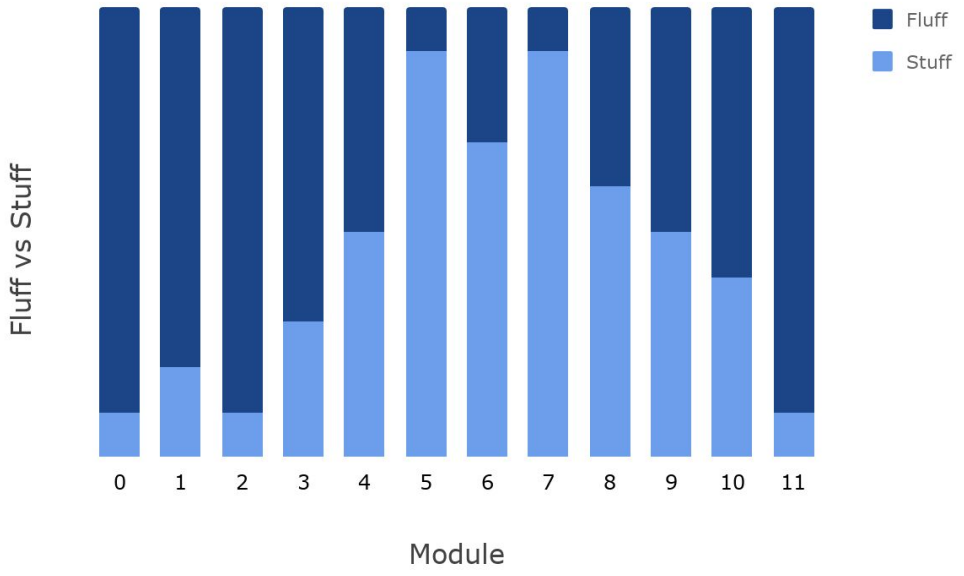
Course outline

- Module 1: Putting the Course in Context
- Module 2: Introducing MuleSoft, the Application Network Vision and Anypoint Platform
- Module 3: Establishing Organizational and Platform Foundations
- Module 4: Identifying, Reusing and Publishing APIs
- Module 5: Enforcing NFRs on the Level of API Invocations Using Anypoint API Manager
- Module 6: Designing Effective APIs

Course outline

- Module 7: Architecting and Deploying Effective API Implementations
- Module 8: Augmenting API-Led Connectivity With Elements From Event-Driven Architecture
- Module 9: Transitioning Into Production
- Module 10: Monitoring and Analyzing the Behavior of the Application Network

Varying degrees of fluff and stuff



How the course will work

- Central topic: How to **architect and design application networks** using API-led connectivity and Anypoint Platform
  - Partly **Solution Architecture**, partly **Enterprise Architecture**
- Light on **Business Architecture**, heavy on **Application and Technology Architecture**
- No architecturally **insignificant** design and implementation discussions
  - Fairly detailed discussion on strategies for invoking APIs in a fault-tolerant way
- **No code**, no Java, XML or RAML
  - RAML features are touched-on because they are important for the functioning of an application network

How the course will work

MuleSoft

- Case study: **Acme Insurance**
  - Background and motivation for most discussions
- Some **opinions are expressed** that are ambiguous, without a clear-cut distinction between correct or false
  - Such is the nature of architecture and design
  - **Challenge** the decisions made
  - **Discussion of tradeoffs** involved are important
- **Exercises**
  - Typically as **group discussions**
  - No actual "doing", on the computer, with Anypoint Platform or any of its components
- All architecture diagrams use **ArchiMate 3** notation

Course logistics

MuleSoft

- Class: **08:00 - 17:00** for **3 days**
  - **Panel discussion:** last day **15:00 - 17:00**
- 1 hour **lunch break**, approx. from **12:00 to 13:00**
- **2x15 minute break** each morning and afternoon
- **Please always be on time** for the start of each session!

Course materials

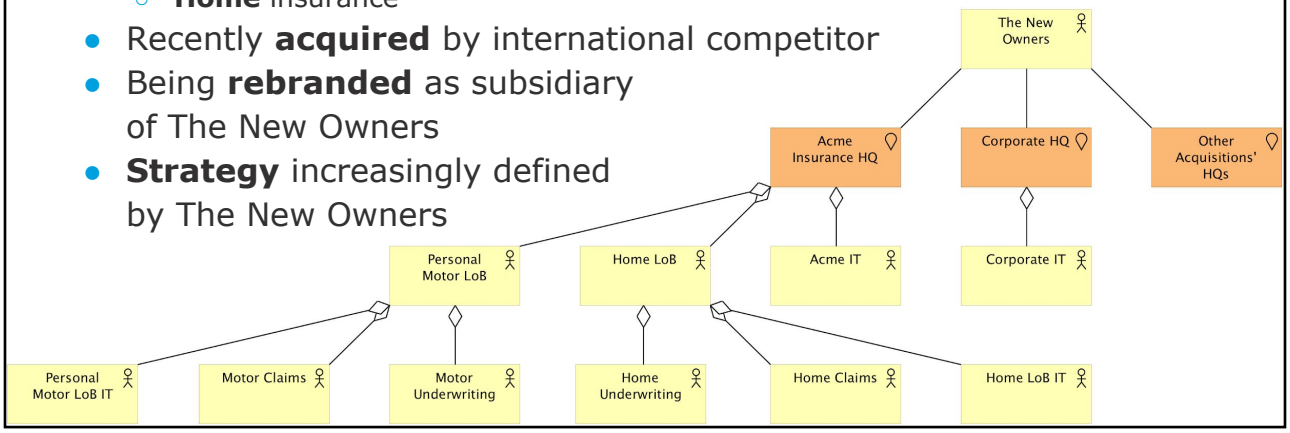
MuleSoft

- You will receive the **Course Manual**
  - A PDF of more than 200 pages
  - Containing all slide material
  - Plus additional discussions and explanations
- **Certification**
  - To be announced
  - For the target audience, attending this class and studying the Course Manual should be sufficient for passing the exam

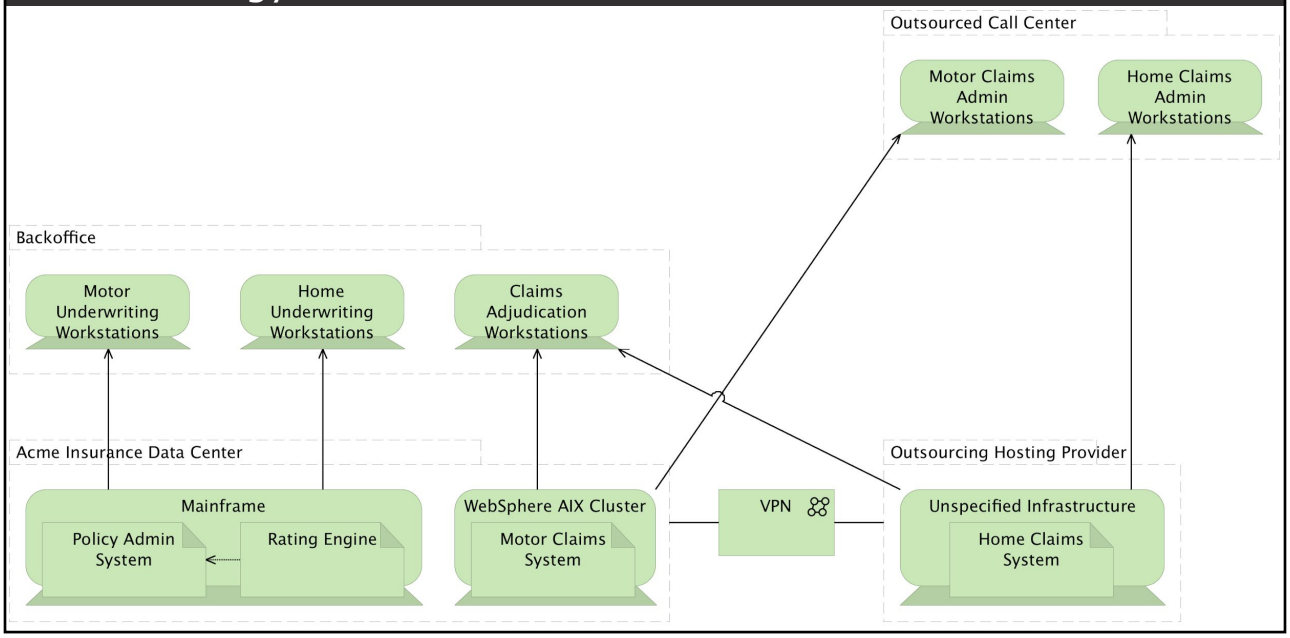
Introducing Acme Insurance

The Acme Insurance organization

- Well-established, medium-sized, regional **insurance provider**
- Two lines of business (LoBs):
  - **Personal motor** insurance
  - **Home** insurance
- Recently **acquired** by international competitor
- Being **rebranded** as subsidiary of The New Owners
- **Strategy** increasingly defined by The New Owners



A glimpse into Acme Insurance's baseline Technology Architecture



A glimpse into Acme Insurance's baseline Technology Architecture

- **IBM-centric** Data Center with Mainframe and clusters of AIX machines
- **Policy Admin System** runs on Mainframe and is used by Motor and Home Underwriting
  - Motor and Home policies use different data schemata
- **Motor Claims System** is operated in-house on WebSphere / AIX
- Web-accessible **Home Claims System** is operated externally
- Claims systems used by Acme Insurance's **Claims Adjudication**
- Claims systems also used by **outsourced call center**

Acme Insurance's motivation for change