W3C RIF – Vendor Use Cases

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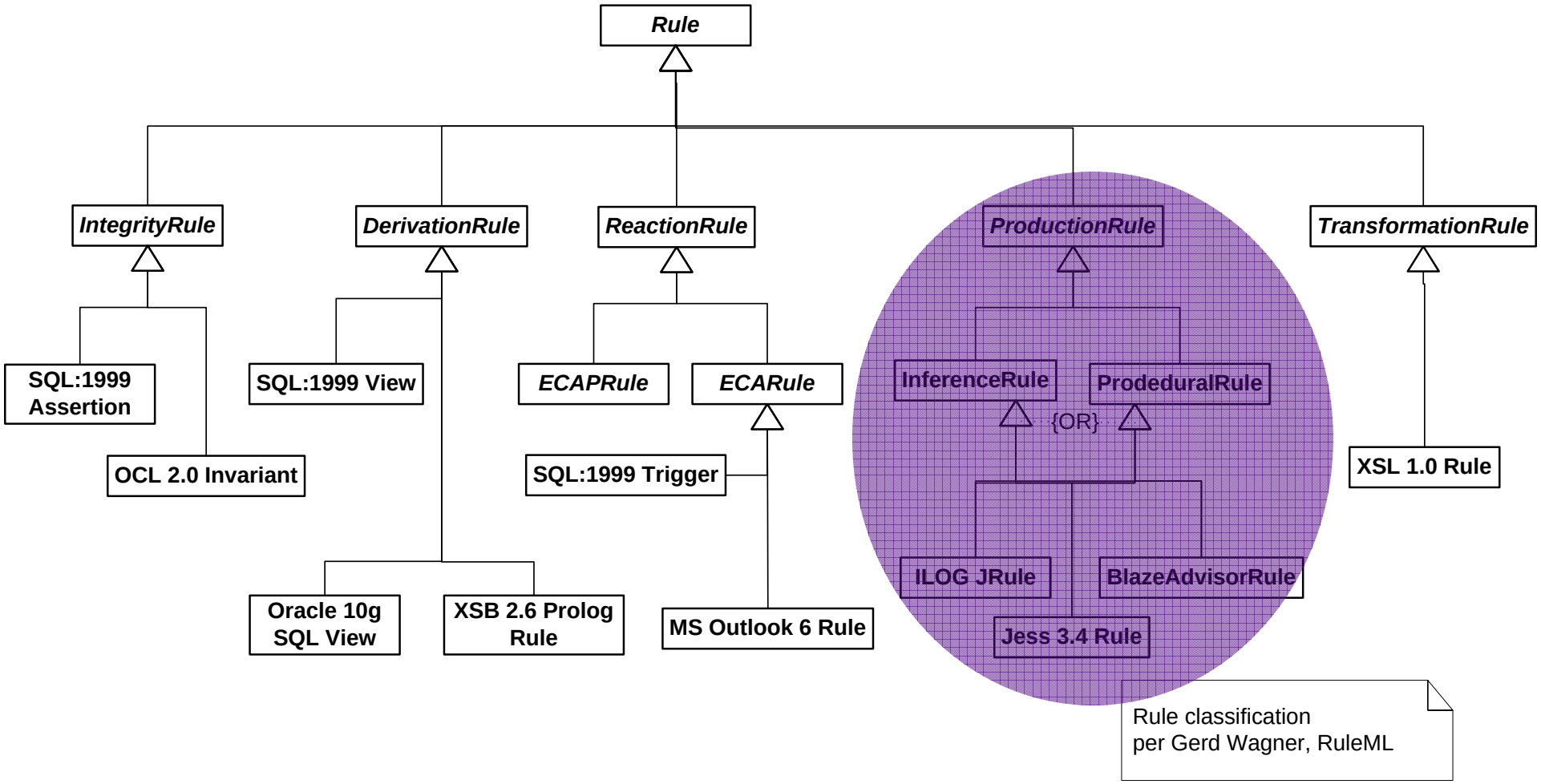
Paul Vincent
Fair Isaac Blaze Advisor
Fair Isaac

Possible classifications…

- Rule
  - Production
  - Constraint
  - Data / vocabulary relationship
  - Business (statement – no execution context)
  - ???
- Interchange
  - A to B = 1 way
  - A to B + B to A = 1 way and return
  - Any to A = Receive from any
  - Any to Any = Multi-broadcast
- Format
  - … leading to language (at some point) eg RuleML etc

Context: rule types …



Use Case #1: Change PR Rule Engine

- Scenario: User determines they want to switch from rule engine A to rule engine B
- Case: rules migration between vendors (usually engine vendors)
- Example: start project with vendor A, decide need performance / management / price advantages from vendor B, transfer* 20K rules to new vendor environment while retaining as much information as possible
- Web aspects: Not usually applicable, but for example the data representation which the rules execute against could be XML
- Interchange: usually 1-way, 1-time, design-time
  - Could also be handled by PRR OCL* eg using XMI

R = PR
I = A to B

* OMG also investigating
Rule Mgmt std for authoring aspects

Use Case #1: Analysis

- Success Factors:
  - What % of rules could be covered by RIF
  - Verification and validation of the rules target vs host
  - Only relevant for “same class of platform” ?
    eg from 1 Rete engine to another
    eg from 1 CL compliant system to another
    - Interchange across rule system platforms:
      what is the business benefit ?

Effectively this is the same case as

a – Ilog “rule interchange between partners”

b – IRS supplies rules representing Form 1040 to anyone interested in executing them

b – User deploys rules on a different environment to that assumed by authoring environment

R = PR
I = any to A

R = PR
I = any to any

R = PR
I = A to any

Use Case #2: Realtime contract exchange

- Scenario: SystemA communicates rules to SystemB for execution
- Case: supplychain / SLA / contract exchange
  [CA ISO, ACORD/THG, …]
- Example:
  1. RFP includes fulfillment rules and these are interpreted by a supplier to identify if the order can be fulfilled
  2. PO is placed and fulfillment rules apply
- Web aspects: Message is communicated over web
  + web service for accepting RFPs
- Interchange: real-time; rules are executable

R = PR
I = any to any

Use Case #2: Analysis

- Success Factors:
  - Coverage of contract rules?
  - Runtime cost (speed) of mapping RIF to execution engine format

Effectively this is the same case as

a – REWERSE “e-commerce”

b – ACORD/SPX: insurance P&C schema
+ schema extension mechanism
+ rule extensions (using XPATH) for data interdependencies
cf RosettaNet etc

R = PR
I = any to any

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Use Case #3: Government take-up of BRE

- Scenario: Govt can only / prefers to utilize COTS s/w that complies with vendor-neutral standards
- Case: IT project to test regulation compliance against US corporation-supplied data; hardcoded rules in 3GL as "BREs are vendor-specific"
- Web aspects: W3C standards are (considered) vendor-neutral
- Interchange: theoretical only!

R = PR
I = N/A

Use Case #3: Analysis

- Success Factors:
  - Exists!

Effectively this is the same case as #1
[Nor Govt]