PBS XML Schema Version 2.1

Steve Ball
PharmBiz

History

- Version 1.1.1 December 2006

- Version 1.3 May 2007

- Version 1.4 July 2007

- Version 1.5 September 2007

- Version 2.0 (draft) November 2007

- Version 1.6 July 2008

Version 2.1

- PBS XML Schema v2.1

- Produced by PharmCIS

- Due mid-2009

Release Schedule

- Notification: April 2008

- Draft: May 2008

- Final draft: June 2008

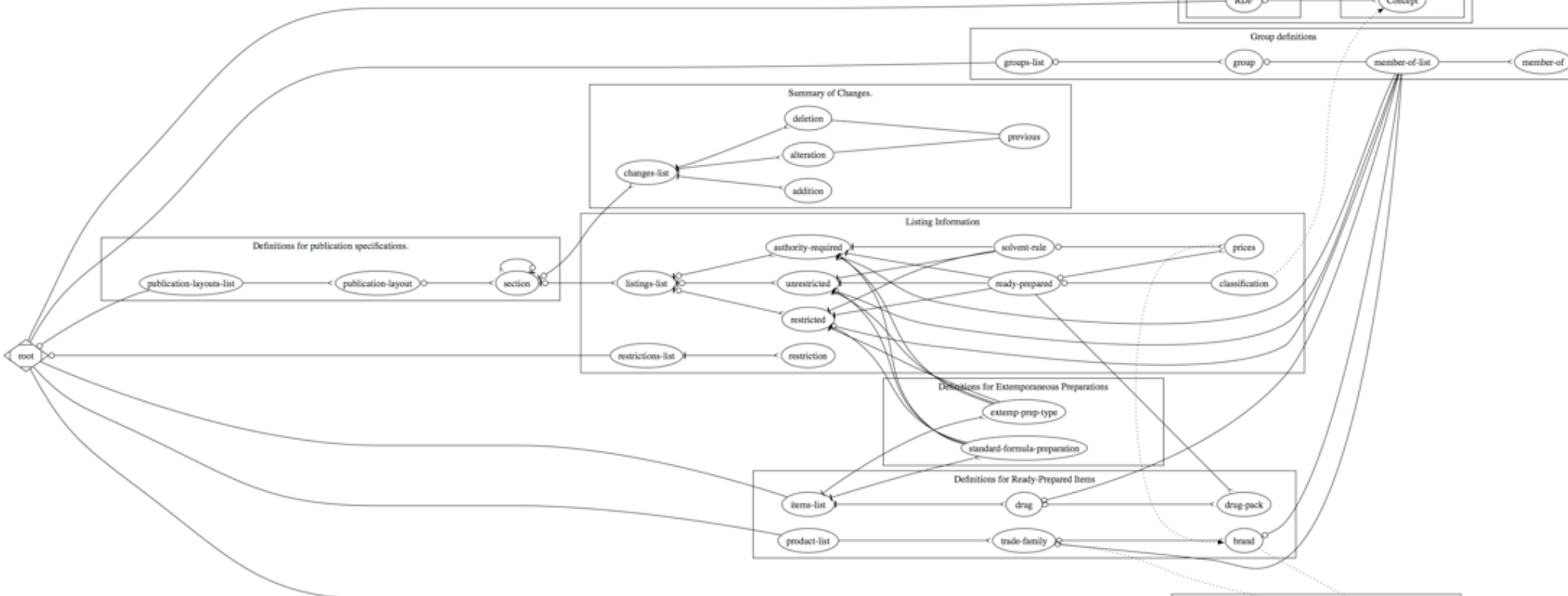- Test data available: July/August 2008
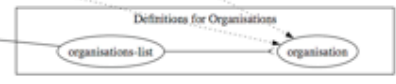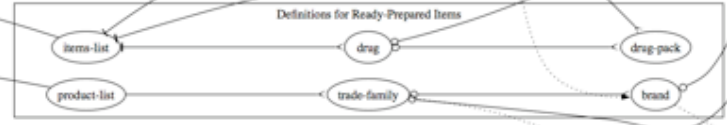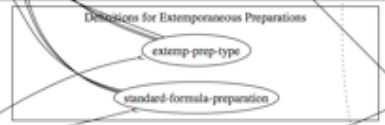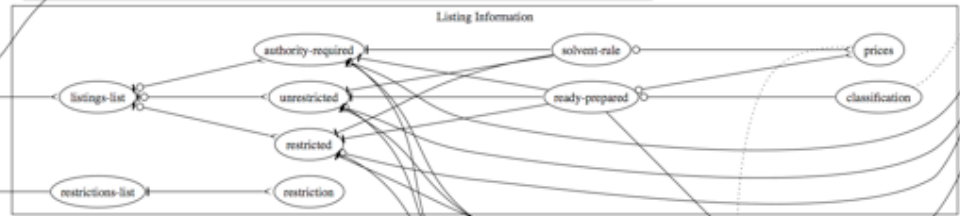
- Production data: mid-2009

Overview

- Namespace URI

- Prescribing Rules

- Drug modeling

- Summary of Changes

Overview

- Restrictions and Authorities

- Organisations and Responsible Person

- Groups

Legend

choice
option_2
option_1

zero — one — many

link source ····> target

Semantic Web definitions

RDF definitions.
RDF

SKOS definitions.
Concept

Group definitions

groups-list — group — member-of-list — member-of

Summary of Changes.

changes-list
deletion
alteration
addition
previous

Definitions for publication specifications.

publication-layouts-list — publication-layout — section

Listing Information

authority-required
solvent-rule
prices

listings-list
unrestricted
ready-prepared
classification

restricted

restrictions-list — restriction

Definitions for Extemporaneous Preparations

extemp-prep-type
standard-formula-preparation

Definitions for Ready-Prepared Items

items-list — drug — drug-pack

product-list — trade-family — brand

Definitions for Organisations

organisations-list — organisation

root

PBS XML Schema
Version 2.1 Draft
[Viewing only "important" elements]

Monday, 28 April 2008

XML Namespace

- New namespace URI

  - http://schema.pbs.gov.au

- Related namespace URIs

  - http://schema.pbs.gov.au/Change

Prescribing Rules

- Has PBS Item Code

- Separate Extemp and solvents:

  - pbs:ready-prepared

  - pbs:solvent-rule

  - pbs:extemp-prep-type, pbs:standard-formula-preparation

Prescribing Rules

- What product does a PR list?

  - Unit of use, or

  - A pack?

- Link to TPPs (pbs:brand) via pbs:prices

- Proposed: link to one-or-more MPPs (pbs:drug-pack)

Prescribing Rules

- Notes and cautions are only attached to prescribing rules

    - Applications may need to group together for display
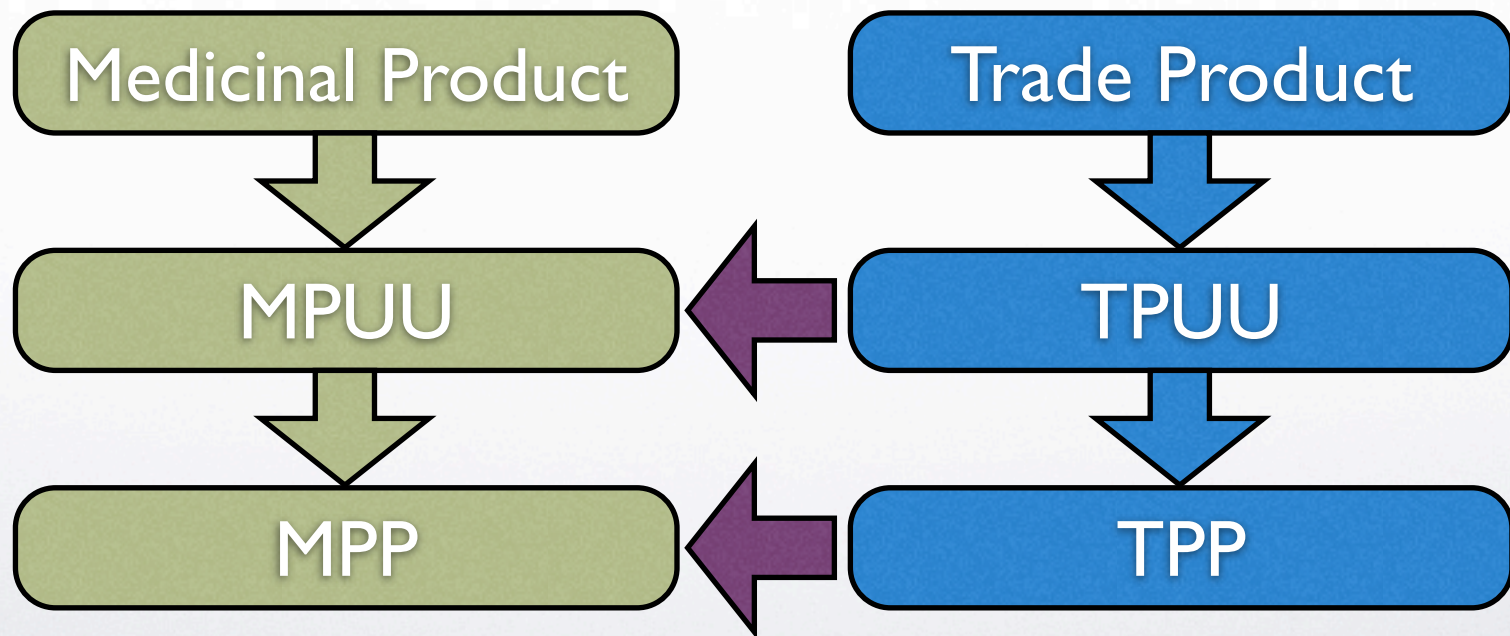
AMT

- PBS XML defines the PBS schedule

- XML has all data necessary to represent PBS schedule

- PBS XML recipient does not require AMT license

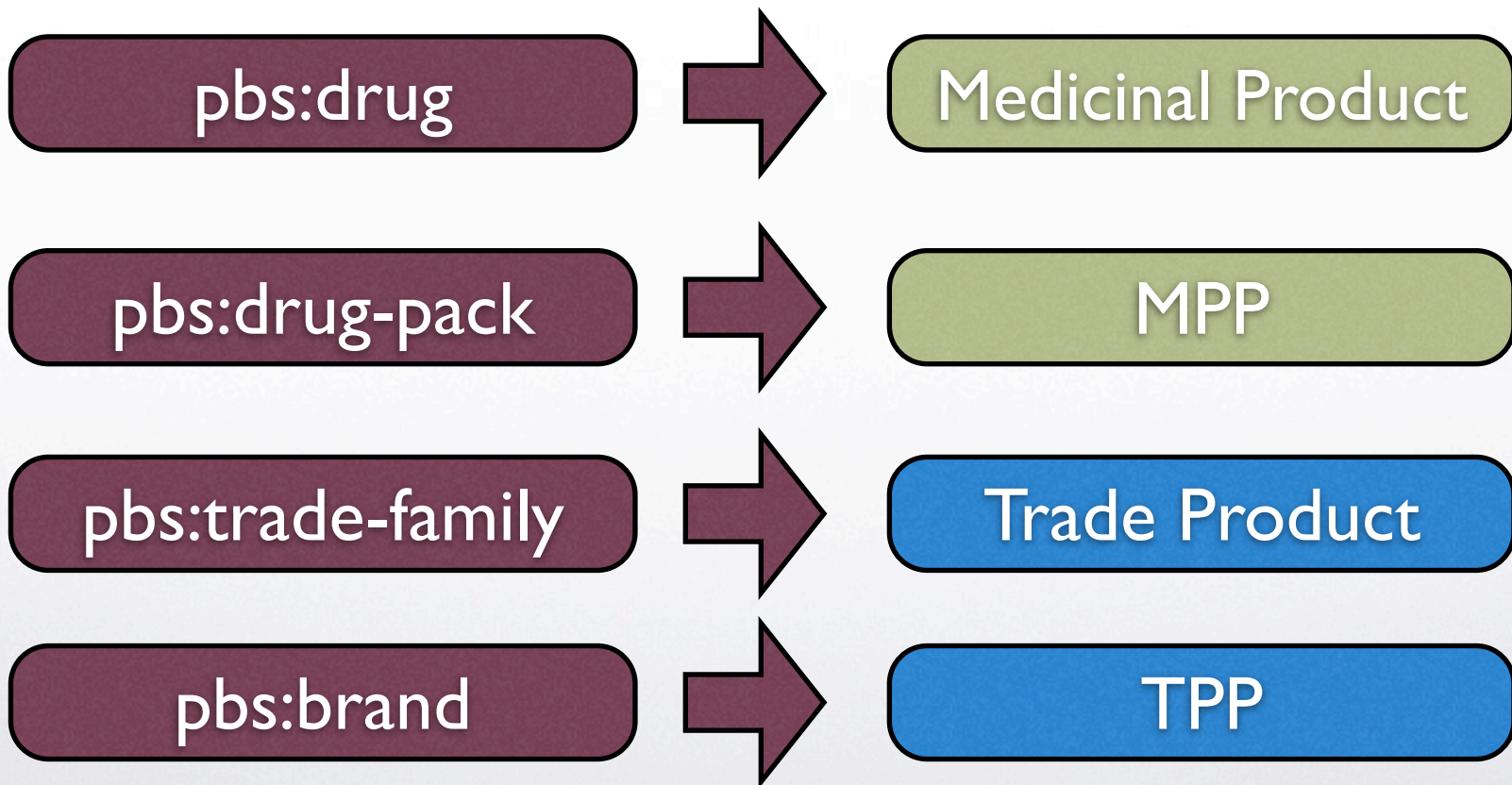- XML has sufficient data to allow AMT to annotate

Drug Modeling

- Nehta AMT logical data model

Drug Modeling

- PBS alignment with Nehta AMT

pbs:drug	→	Medicinal Product
pbs:drug-pack	→	MPP
pbs:trade-family	→	Trade Product
pbs:brand	→	TPP

Drug Modeling

- Generic = Medicinal Product (AP) = pbs:drug

- Medicinal Product Pack = pbs:drug-pack

Drug Modeling

- Brand name = Trade Product = pbs:trade-family

- Item brand = Trade Product Pack = pbs:brand

Drug Modeling

- pbs:drug has code

- pbs:drug, pbs:drug-pack and pbs:brand will include AMT UUID

- pbs:drug, pbs:drug-pack, pbs:brand, pbs:trade-family have title/description

  - Usually is AMT Preferred Term

- Not all PBS Items will be in AMT

Drug Modeling

- Form and strength is text

- Form may be found in AMT

- pbs:brand (TPP) description will include pack size

Summary of Changes

- Every change included

- Previous schedule's data included

  - Ensures this schedule is standalone

- pbs:addition

- pbs:alteration

- pbs:deletion

Additions

- Link to new element

```
<pbs:changes-list>
  <pbs:info>
    <db:title>Additions - Items</db:title>
  </pbs:info>
  <pbs:addition>
    <pbs:any-reference
    xlink:href='#LISTING-12345'/>
  </pbs:addition>
</pbs:changes-list>
```

Deletions

- Includes data from previous schedule

```
<pbs:changes-list>
  <pbs:info>
    <db:title>Deletions - Brands</db:title>
  </pbs:info>
  <pbs:deletion>
    <pbs:previous>
      <pbs:brand xml:id='BRAND-1357'>
        <pbs:drug-pack-reference
          xlink:href='#APP-6789'/>
        <pbs:pack-size>24</pbs:pack-size>
      </pbs:brand>
    </pbs:previous>
  </pbs:deletion>
</pbs:changes-list>
```

Alterations

- Link to new

- Include previous data

```
<pbs:changes-list>
  <pbs:info>
    <db:title>Alterations - Prices</db:title>
  </pbs:info>
  <pbs:alteration>
    <pbs:any-reference
    xlink:href='#CP-23456'/>
    <pbs:previous>
      <pbs:retail>2.40</pbs:retail>
    </pbs:previous>
  </pbs:alteration>
</pbs:changes-list>
```
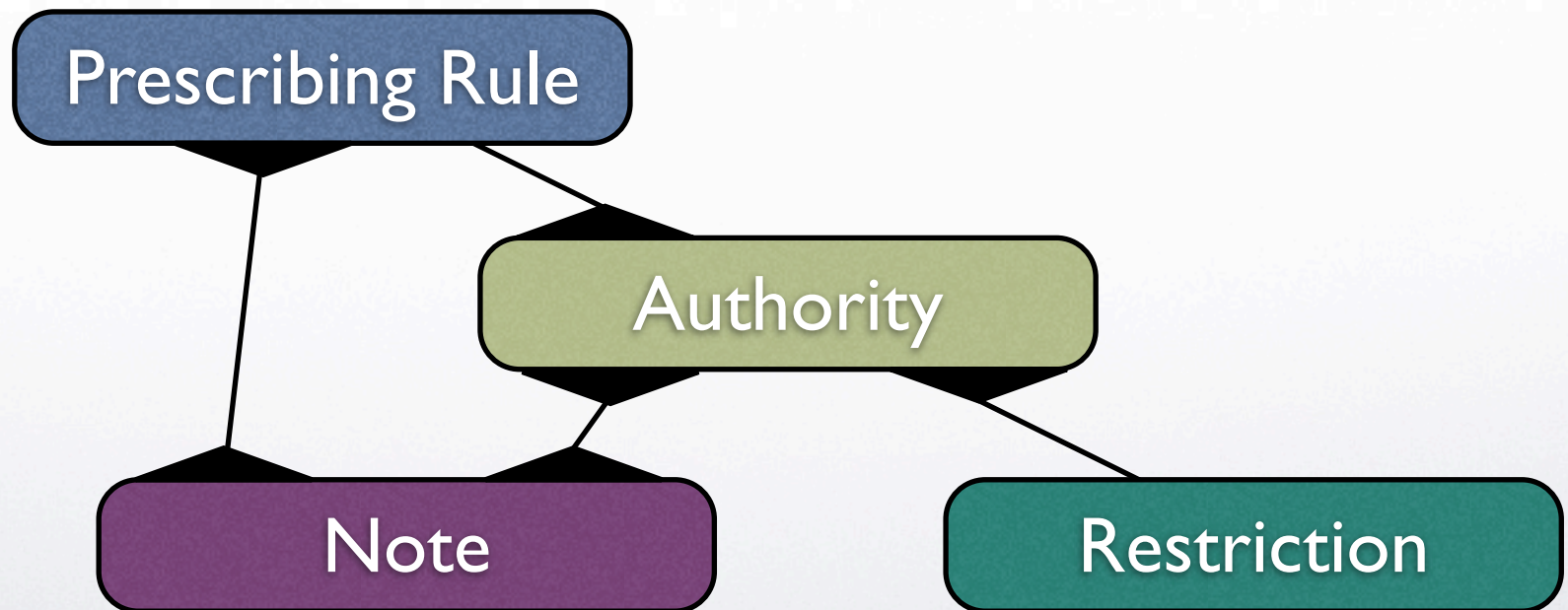
Restrictions

- Restrictions are now called pbs:restrictions

- Connected to PR via pbs:authority

- Split restriction text into purpose and administrative text

- Notes may be attached to pbs:authority

Restrictions

- Authority links restriction to prescribing rule

Authorities

- pbs:authority describes how to obtain an authority from Medicare Australia

- Often specified in text of restriction

- Moving towards specification as data

- Need to change granularity of restrictions

Organisations

- No longer called "Manufacturers"

- Also have "Responsible Person"

  - Still have two letter code

- Identification of brands

Groups

- Groups specify a relationship between elements

- Relationship is not hierarchical

- Groups contain members

  - All members must be same type

- Member element expresses group membership

Groups

- pbs:group

```
<pbs:groups-list>
  <pbs:group xml:id='GRP-BIO-1'>
    <pbs:name>Group-1</pbs:name>
    <pbs:label>Bioequivalence group 1</pbs:label>
    <pbs:member-type>pbs:brand</pbs:member-type>
  </pbs:group>
</pbs:groups-list>
```

Groups

- pbs:member-of

```
<pbs:brand xml:id='BRAND-1234'>
  <pbs:member-of-list>
    <pbs:member-of xlink='#GRP-BIO-1'/>
  </pbs:member-of-list>
</pbs:brand>
<pbs:brand xml:id='BRAND-5678'>
  <pbs:member-of-list>
    <pbs:member-of xlink='#GRP-BIO-1'/>
  </pbs:member-of-list>
</pbs:brand>
```

Groups

- Groups of groups

- Bioequivalence

- Formularies

- Price reference groups

- Dispensing fee types