

## CASCADING STYLE PICKLIST

### What do you mean by cascading?

"Cascading" is the flow of data i.e. the value of particular child is derived from its parent.

Let's create a Cascading style picklist in TM1.

For Example, we have a picklist of Continents, when a particular continent is selected then second picklist pops up as countries of the selected continent only, and further when a particular country is selected third picklist pops up as the cities of that particular country only.

### Problem 1

We have some Continents, then countries of those continents and cities of those countries.

We have to make 3 picklists, 1<sup>st</sup> picklist of continents, 2<sup>nd</sup> of countries, 3<sup>rd</sup> of cities. But in 2<sup>nd</sup> picklist only the children of selected member of 1<sup>st</sup> picklist should appear and same with the 3<sup>rd</sup> picklist, only the children of selected member of 2<sup>nd</sup> picklist should appear.

We have Continents, their respective countries and their respective cities

Continent	Country	City
AustraliaCont	Australia	Sydney
Asia	New Zeala	Melbourne
Africa	India	Perth
Europe	UAE	Adelaide
North America	China	Brisbane
South America	Japan	Auckland.
	Turkey	Wellington.
	South Afri	Christchurch.
	Ethiopia	Hamilton.
	Nigeria	Napier
	UK	Mumbai
	Germany	Delhi
	France	Kolkata
	Switzerlan	Bangalore
	Spain	Hyderabad
	Belgium	Dubai
	USA	Abu Dhabi
	Canada	Sharjah
	Brazil	Ajman
		Fujairah
		Beijing

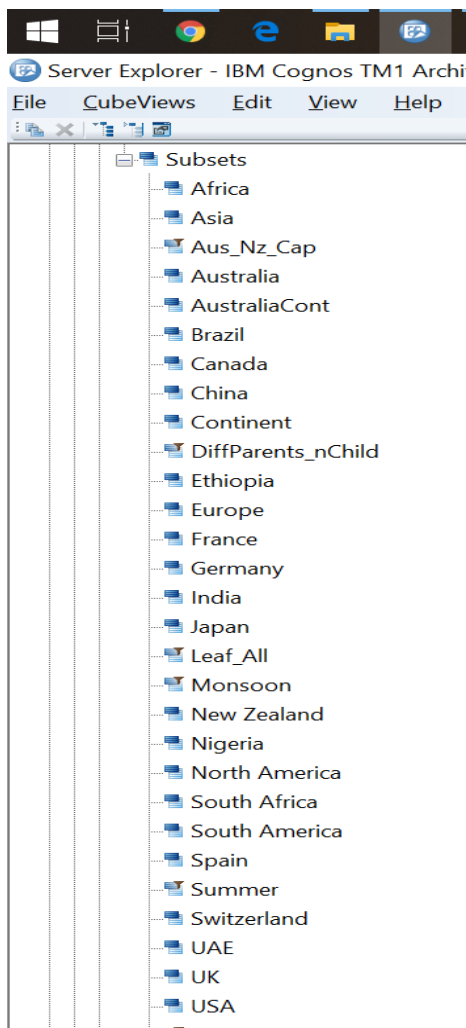


Now we have to make 3 picklists, 1 for continent, 1 for country, and 1 for city in Planning Analytics.

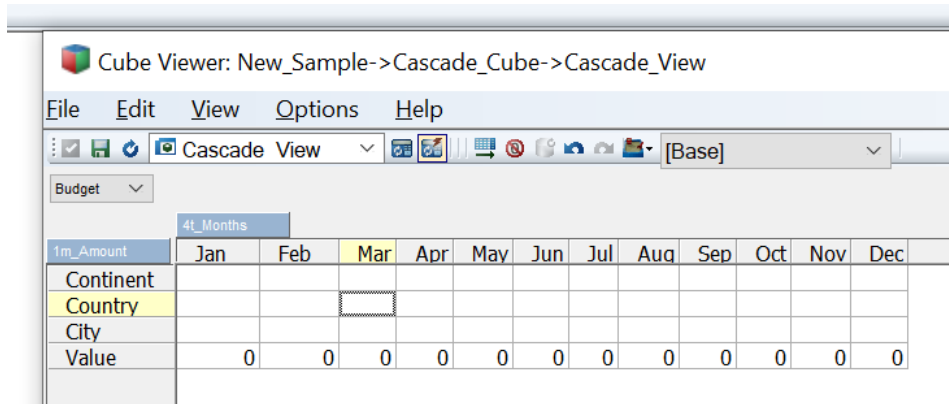
Steps:

1. Create Version, Months & Measure dimension using TI process.
2. Create a hierarchy dimension of these countries naming it as 2h\_CountryZone using TI process where Continent is the parent of Country and Country is the parent of City.
3. Create subsets using MDX for these particular group of elements so that they could be dynamic.
  - (i) Continents i.e. (continents would contain all continent)
  - (ii) Group of countries in a continent. i.e. (AustraliaCont) subset would only contain countries Australia & New Zealand.
  - (iii) Group of cities in a country. i.e. (India) Subset would only contain cities of India.

Sample of Subsets created in these process



4. Create a cube and the cube view as follows



Cube Viewer: New\_Sample->Cascade\_Cube->Cascade\_View

File Edit View Options Help

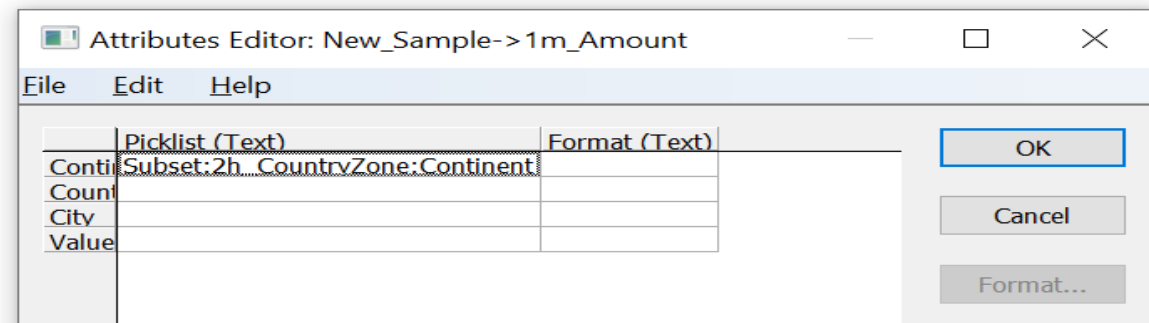
Cascade View [Base]

Budget

4t\_Months

1m_Amount	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
Continent												
Country												
City												
Value	0	0	0	0	0	0	0	0	0	0	0	0

5. Now we create a picklist for Continent by adding picklist attribute.



Attributes Editor: New\_Sample->1m\_Amount

File Edit Help

	Picklist (Text)	Format (Text)
Conti	Subset:2h...CountryZone:Continent	
Count		
City		
Value		

OK

Cancel

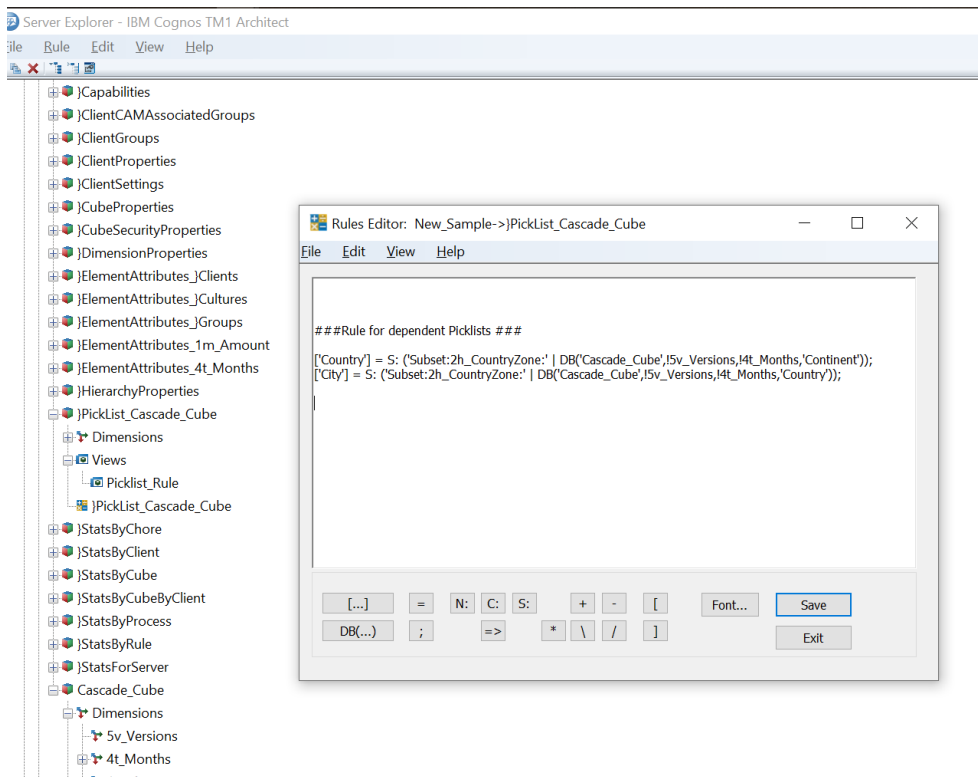
Format...

6. Then we create a **picklist cube** in **control objects** and generate a rule for Country and city, so that only the elements of selected parent appear in next picklist.

Below is the rule we have used to create picklists for the other two categories, the rule will automatically pick the subsequent picklist for the second category when first element is selected in the first picklist, i.e. drop down will only appear for the selected continent.

### Formulas Applied

```
[Country] = S: ('Subset:2h_CountryZone:' | DB('Cascade_Cube',!5v_Versions,!4t_Months,'Continent'));
[City] = S: ('Subset:2h_CountryZone:' | DB('Cascade_Cube',!5v_Versions,!4t_Months,'Country'));
```

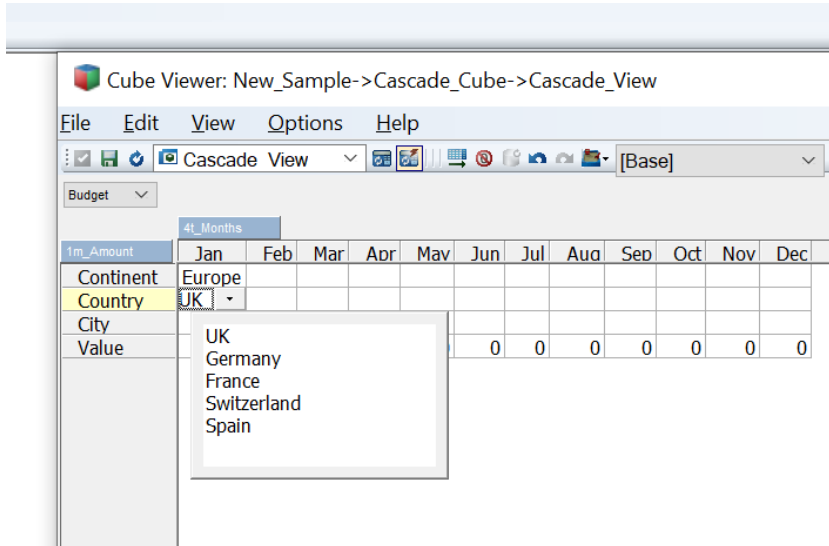


The screenshot shows the IBM Cognos TM1 Architect interface. On the left, a tree view displays the project structure, including 'PickList\_Cascade\_Cube' and its associated 'Views' and 'Picklist\_Rule'. The main window is the 'Rules Editor' for 'New\_Sample->]PickList\_Cascade\_Cube'. The editor contains the following rule definition:

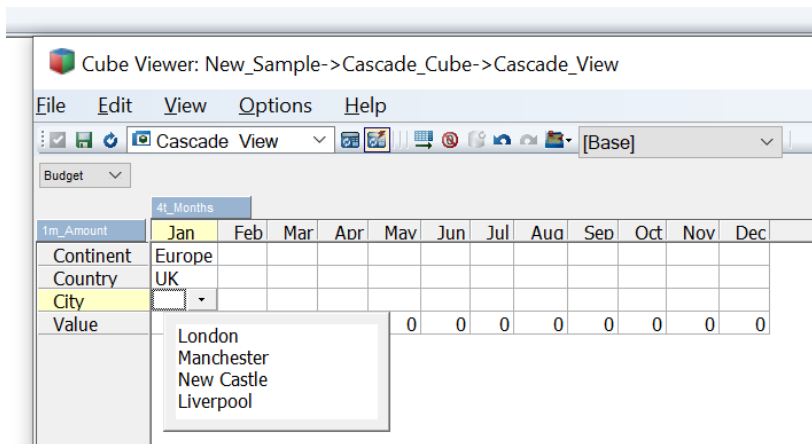
```
###Rule for dependent Picklists ###
[Country] = S: ('Subset:2h_CountryZone:' | DB('Cascade_Cube',!5v_Versions,!4t_Months,'Continent'));
[City] = S: ('Subset:2h_CountryZone:' | DB('Cascade_Cube',!5v_Versions,!4t_Months,'Country'));
```

The Rules Editor window includes a menu bar (File, Edit, View, Help) and a toolbar with buttons for [...], =, N:, C:, S:, +, -, [, Font..., Save, DB(...), ;, =>, \*, \, /, ], and Exit.

7. Here are the results we get after applying the rule.



We can clearly see only the children of Europe can be seen in the picklist for Countries.



Now when UK is selected only the Children of UK appear in the city picklist.

**We have successfully created a Cascading style picklist in TM1 Architect.**

## Problem 2

Modifying a picklist in which only particular Continents appear.

For example,

1. **Jan to April** we need only (Europe, Asia and Africa).
2. **May to August** we need only (South America, North America and AustraliaCont).
3. **September to December** we need only (Europe, Asia).

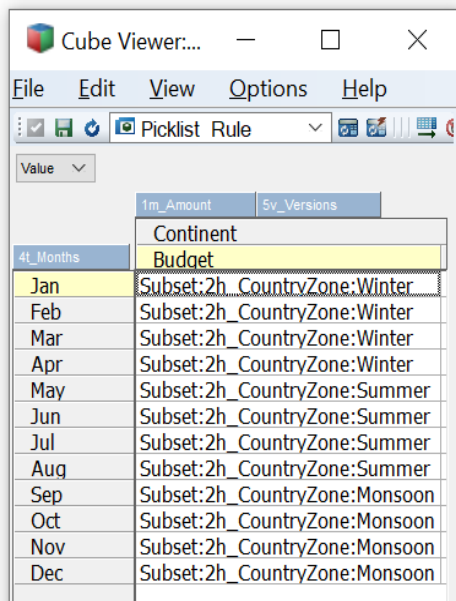
Solution :

Create 3 more Subsets as below:

1. **Winter** Containing (Europe, Asia and Africa).
2. **Summer** Containing (South America, North America and AustraliaCont).
3. **Monsoon** Containing (Europe, Asia).

Then open control cube for picklist which we have created i.e. }PickList\_Cascade\_Cube

Just Enter the Subset Which you have created in the Cube View as follows:



4t_Months	Budget
Jan	Subset:2h_CountryZone:Winter
Feb	Subset:2h_CountryZone:Winter
Mar	Subset:2h_CountryZone:Winter
Apr	Subset:2h_CountryZone:Winter
May	Subset:2h_CountryZone:Summer
Jun	Subset:2h_CountryZone:Summer
Jul	Subset:2h_CountryZone:Summer
Aug	Subset:2h_CountryZone:Summer
Sep	Subset:2h_CountryZone:Monsoon
Oct	Subset:2h_CountryZone:Monsoon
Nov	Subset:2h_CountryZone:Monsoon
Dec	Subset:2h_CountryZone:Monsoon



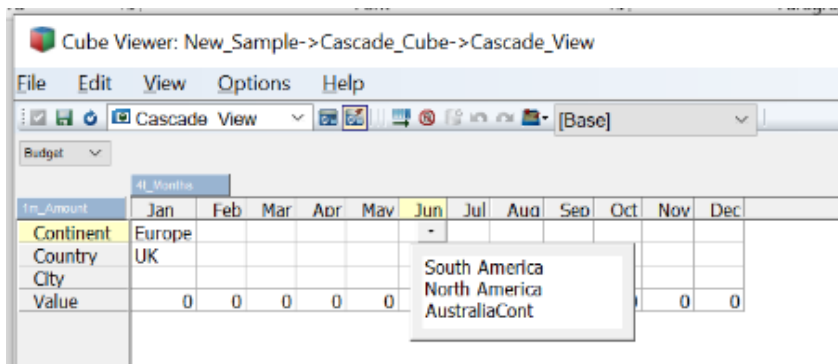
Now,

Only Europe, Asia and Africa are in the picklist for Jan to April.

Only South America, North America and AustraliaCont (refer below screenshot) are in the picklist for May to August

&

Only Europe & Asia are in September to December



Successfully created Cascading picklist in which only required elements appear.

Note – This Cascading style picklist can be used in many scenarios, one of it would be when a particular sale happens in a particular season, i.e. seasonal fruits.