

Saxon - Support #4960

XSLT 3 Transform namespace, root element and conditional attribute

2021-04-02 07:02 - Fiona Chen

Status: Closed	Start date: 2021-04-02
Priority: Low	Due date:
Assignee:	% Done: 0%
Category:	Estimated time: 0:00 hour
Sprint/Milestone:	Spent time: 0:00 hour
Legacy ID:	Fix Committed on Branch:
Applies to branch: 9.9	Fixed in Maintenance Release:
Description	
<p>Hello: I am developing an XSLT 3 module to transform all of the namespaces, the root element and conditionally remove the child element's attributes. Problem: I can't manage to transform the root element from requestConfirmation to requestProduct. Have tried other methods, either the xmlns="http://example/confirmation" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance" persistently presents itself in all of the subsequent elements with namespaces or root is not transformed.</p> <p>What is the XSLT 3 solution?</p> <p>Thanks!</p>	

History

#1 - 2021-04-02 10:45 - Martin Honnen

To transform the root element, you obviously need a template matching it and then output the new one. For the other elements, one template suffices, for the attributes one XSLT 3 approach would be to use a static param in a shadow attribute:

```
<xsl:stylesheet xmlns:xsl="http://www.w3.org/1999/XSL/Transform"
  version="3.0"
  xmlns:xs="http://www.w3.org/2001/XMLSchema"
  xpath-default-namespace="http://example/confirmation"
  exclude-result-prefixes="#all"
  expand-text="yes">
  <xsl:param name="new-namespace" as="xs:string">http://fc.fasset/product</xsl:param>
  <xsl:param name="keep-atts" static="yes" as="xs:string*" select="'href', 'id'"/>
  <xsl:template match="/*">
    <xsl:element name="requestProduct" namespace="{ $new-namespace }">
      <xsl:apply-templates select="@*" , node()"/>
    </xsl:element>
  </xsl:template>
  <xsl:template match="*">
    <xsl:element name="{local-name()}" namespace="{ $new-namespace }">
      <xsl:apply-templates select="@*" , node()"/>
    </xsl:element>
  </xsl:template>
  <xsl:template _match="{string-join($keep-atts!('@' || .), ' | ')}"/>
  <xsl:template match="@*" />
</xsl:stylesheet>
```

I haven't quite understood whether you expect the attributes you want to keep to be sometimes in a namespace, the above assumes they are in no namespace.

#2 - 2021-04-03 05:36 - Fiona Chen

Cool...

For although I don't particularly need to separate the keep-attr namespace with the trans-namespace, the emailed .xsl does so. I haven't experimented XSLT 3 static param in a shadow attribute to transform attributes with namespace. If you care to demonstrate...for sporting purpose.

Is it possible to translate the scaffold.xqy into an xsl as a parameterized template (if you can call the .xqy from the main template, it is also good), similar to a preprocessing instruction. e.g. the main template calls \$scaffold:confirm[1] which is an equivalent of \$trans-root, calls \$scaffold:confirm[2] which is an equivalent of \$trans-namespace...so on & forth...Any thought ?

#3 - 2021-04-03 05:47 - Fiona Chen

- File scaffold.xqy added
- File xslt3-beta-transform-ns&root.xsl added
- File euro-exotic-dba13-b1ecc301-8e53-4b93-9741-42988405e8a2.xml added

Hello:

Can you please help to remove the original attached [euro-exotic-dba13-b1ecc301-8e53-4b93-9741-42988405e8a2.xml] and [xslt3-beta-remove-comment-change-ns&root.xml]? The mockup contained real brokerage firm names. This new attached xml doesn't.

I also just realise it will be a holiday weekend and I do not wish to spoil it...

Cheers,

Fiona

On Friday, April 2, 2021, 1:45:44 a.m. MST, Saxonica Developer Community notifications@plan.io wrote:

| Issue [#4960](#) has been updated by Martin Honnen.

To transform the root element, you obviously need a template matching it and then output the new one. For the other elements, one template suffices, for the attributes one XSLT 3 approach would be to use a static param in a shadow attribute:

```
<xsl:stylesheet xmlns:xsl="http://www.w3.org/1999/XSL/Transform"
version="3.0"
xmlns:xs="http://www.w3.org/2001/XMLSchema"
xpath-default-namespace="http://example/confirmation"
exclude-result-prefixes="#all"
expand-text="yes">
<xsl:param name="new-namespace" as="xs:string">http://fc.fasset/product</xsl:param>
<xsl:param name="keep-atts" static="yes" as="xs:string*" select="'href', 'id'"/>
<xsl:template match="/">
<xsl:element name="requestProduct" namespace="{ $new-namespace }">
<xsl:apply-templates select="@ , node()" />
</xsl:element>
</xsl:template>
<xsl:template match="">
<xsl:element name="{ local-name() }" namespace="{ $new-namespace }">
<xsl:apply-templates select="@ , node()" />
</xsl:element>
</xsl:template>
<xsl:template _match="{ string-join($keep-atts!('@' || ., ' | ')}"/>
<xsl:template match="@*" />
</xsl:stylesheet>
```

I haven't quite understood whether you expect the attributes you want to keep to be sometimes in a namespace, the above assumes they are in no namespace.

Support [#4960](#): XSLT 3 Transform namespace, root element and conditional attribute

- Author: Fiona Chen
- Status: New
- Priority: Low
- Assignee:
- Category:
- Sprint/Milestone:
- Legacy ID:

- Applies to branch: 9.9
- Fix Committed on Branch:
- Fixed in Maintenance Release:

Hello:I am developing an XSLT 3 module to transform all of the namespaces, the root element and conditionally remove the child element's attributes.Problem:I can't manage to transform the root element from requestConfirmation to requestProduct.
 Have tried other methods, either the xmlns="http://example/confirmation" xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance" persistently presents itself in all of the subsequent elements with namespaces or root is not transformed.
 What is the XSLT 3 solution?

Thanks!

Files xslt3-beta-transform-ns&root.xsl (1.44 KB)
 euro-exotic-dba13-b1ecc301-8e53-4b93-9741-42988405e8a2.xml (3.54 KB)
 xslt3-beta-remove-comment-change-ns&root.xml (3.01 KB)

You have received this notification because you have either subscribed to or are involved in a project on Saxonica Developer Community site.To change your notification preferences, please click here: https://saxonica.plan.io/my/account?tour=mail_preferences

This notification was cheerfully delivered by |
 | |

#4 - 2021-04-03 11:27 - Michael Kay

- File deleted (euro-exotic-dba13-b1ecc301-8e53-4b93-9741-42988405e8a2.xml)

#5 - 2021-04-03 11:27 - Michael Kay

- File deleted (euro-exotic-dba13-b1ecc301-8e53-4b93-9741-42988405e8a2.xml)

#6 - 2021-04-07 15:03 - Norm Tovey-Walsh

- File deleted (xslt3-beta-remove-comment-change-ns&root.xml)

#8 - 2021-04-08 11:19 - Michael Kay

- Status changed from New to AwaitingInfo

Thanks Martin for responding to this. I haven't had time to check the answer but Martin is 100% reliable...

Unless we hear further from you, Fiona, we'll mark this as closed.

#9 - 2021-04-08 21:26 - Michael Kay

- Status changed from AwaitingInfo to Closed

Files

xslt3-beta-transform-ns&root.xsl	1.44 KB	2021-04-02	Fiona Chen
scaffold.xqy	455 Bytes	2021-04-03	Fiona Chen
xslt3-beta-transform-ns&root.xsl	1.52 KB	2021-04-03	Fiona Chen