

# Saxon

## Using Saxon

(This procedure is for both Saxon6.5 and Saxon8, tested Saxon9b with 2.1.8 and had no issues)

Add saxon8.jar to lib/local/. Note that with Cocoon 2.1.5.1 (and probably other versions as well) you need to remove the META-INF directory from the saxon jar, see this [discussion](#) for more info.

Edit src/webapp/WEB-INF/cocoon.xconf and declare the component for Saxon after the other xsit-processor components ...

```
<component logger="core.xsilt-processor"
    role="org.apache.excalibur.xml.xslt.XSLTProcessor/saxon"
    class="org.apache.excalibur.xml.xslt.XSLTProcessorImpl">
    <parameter name="use-store" value="true"/>
    <parameter name="incremental-processing" value="false"/>
    <parameter name="transformer-factory" value="net.sf.saxon.TransformerFactoryImpl"/>
</component>
```

Note: For Saxon7 and Saxon8 use "transformer-factory" net.sf.saxon.TransformerFactoryImpl and for Saxon6 use com.icl.saxon.TransformerFactoryImpl

Edit src/webapp/samples/hello-world/sitemap.xmap to add the "xsit-saxon" transformer ...

```
<map:components>
    <map:transformers default="xsit">
        <map:transformer name="xsit-saxon" pool-grow="2" pool-max="32" pool-min="8"
            src="org.apache.cocoon.transformation.TraxTransformer">
            <use-request-parameters>false</use-request-parameters>
            <use-browser-capabilities-db>false</use-browser-capabilities-db>
            <xslt-processor-role>saxon</xslt-processor-role>
        </map:transformer>
    </map:transformers>
</map:components>
```

Add a sitemap match to use the xsit-saxon transformer ...

```
<map:match pattern="hello.html">
    <map:generate src="content/hello.xml"/>
    <map:transform type="xsit-saxon" src="style/xsl/page2html.xsl"/>
    <map:serialize type="html"/>
</map:match>
```

If you want to see Saxon being used then raise the [ExploringTheLogs](#) and look in core.log

## Other Issues

There is a problem with XSP in combination with Saxon7. When the Saxon libraries are in your classpath, the root element of a page generated by XSP gets two extra namespace attributes:

```
xmlns:xml="http://www.w3.org/XML/1998/namespace" xmlns:xsp="http://apache.org/xsp"
```

This is only noticeable if the XSP generator is immediately followed by a serializer. In this case, Internet Explorer will complain: *The namespace prefix is not allowed to start with the reserved string "xml"*. Firefox won't mind these namespace prefixes. A solution is to add an identity transformer (using Xalan or Saxon) after the generator.

## Mailing list discussions

Some other discussion points (be careful, there are some furphies which may confuse you):

1. Cocoon documentation: [Trax/XSLT Transformer](#)
2. Discussion: [Re: Transforming Big XML Files](#)
3. Discussion: [Re: Multiple XSL Transformers](#)
4. Discussion: [Re: Saxon and Cocoon](#)

5. Discussion: [Re: default xsl transformer?](#)
6. Discussion: [Re: BUG: EmptyStackException](#) - Timothy Larson describes how he configured Saxon
7. Discussion: [Re: Using Saxon 7.9 with Cocoon?](#) (note Vadim's comment about needing CVS version of excalibur-xmlutils)

## More information

- [XSLT 2.0 - An Interview with Michael Kay](#)