

WebHub System, version 3.253
configuration version #004 ("cv004")

Sample Configuration Files

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Overall Notes

WebHub v2.051+ uses a cross-platform sub-system named ZaphodsMap for configuration. The concept of "SetupID" from earlier versions of WebHub is implemented as "Context" in ZaphodsMap. This idea lets a developer specify selected settings with different values depending on which machine the application runs on, e.g. Home versus Office. As you read through this document, you will occasionally see xml tags that have an attribute named "context". These lines are reminders that you have the option of specifying that any *leaf* tag applies only to a given context. We define a *leaf* tag as one which does not contain other tags.

ZaphodsMap code is open-source. Full source to ZaphodsMap is included with WebHub and is available on sourceforge. Further details about ZaphodsMap and code samples may be found at www.ZaphodsMap.com.

In this document, the current XSD for each configuration file is highlighted in red. Using the correct XSD filename is important if and only if you run ZMAdmin or use a tool such as Dreamweaver to validate the contents of your configuration files. (In Dreamweaver, use the menu: **File > Check File > Validate as XML.**)

Whenever an xml value is meant to be a boolean, it must be entered as either "true" or "false" (lowercase).

The style sheet for all WebHub configuration files is the same:

<http://www.ZaphodsMap.com/zmdesign/css/ZaphodsMap.xsl>. Using the stylesheet is optional. It helps when you want to view your configuration file using a web browser such as Internet Explorer or Firefox.

In this document, a few comments are included, and shown in ((double parens)). Do not put comments into your own configuration files! Anything shown in this color represents a planned feature.

HREF Tools Corp. has developed a tool named "ZMAdmin" which helps with browsing, opening and viewing your own ZaphodsMap configuration files. ZMAdmin installs along with the WebHub Runtime System. Use Start > Programs > HREF Tools > WebHub > ZMAdmin to launch it and explore your configuration.

File: HREFTools\WebHub\cv004\ZMKeybox.xml

This ZMkeybox.xml file is **created automatically** when you install the WebHub Runtime System. It will be located under the folder identified by the global environment variable named "ZaphodsMap".

The "keys" in this keybox file lead to the various configuration files used by WebHub.

```
<?xml version="1.0" encoding="UTF-8"?>
<?xmlstylesheet type="text/xsl" href="http://www.ZaphodsMap.com/zmdesign/css/ZaphodsMap.xsl"?>
<ZMKeybox xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xsi:noNamespaceSchemaLocation="http://www.zaphodsmap.com/zmdesign/xsd/ZMKeybox200606.xsd">
<Variables begin="" end="">      (( variables are always optional; the scope is the current xml file ))
  <Var name="DataPath" value="d:\AppsData\WebHub"/>
  <Var name="AppConfigPath" value="D:\Apps\HREFTools\WebHub\config"/>
</Variables>
<KeyGroups>
  <KeyGroup name="WebHub">
    <Keys>
      <Key2File   name="CentralInfo"           filename="{DataPath} WHCentralInfo.xml"/>
      <Key2File   name="License"              filename="{DataPath} WHLicense.xml"/>
      <Key2File   name="AppRestorer"          filename="{DataPath} WHAppRestorer.xml"/>
      <Key2File   name="DelphiWizard"         filename="{AppConfigPath} WHDelphiWizard.xml"/>
      <Key2File   name="NetworkInfo"          filename="{DataPath} WHNetworkInfo.xml"/>
      <Key2File   name="ServiceControl"        filename="{DataPath} WHServiceControl.xml"/>
      <Key2File   name="SystemMessages"       filename="{DataPath} WHSystemMessages.xml"/>
      <Key2File   name="EditorAutoFill"        filename="{AppConfigPath} WHEditorAutoFill.txt"/>
      <Key2Folder name="Cover PageInfo"      folder="{DataPath} Cover PageInfo\ />
      <Key2Folder name="Packages"             folder="c:\Apps\HREFTools\WebHub\lib\pkgd07\ />
    </Keys>
  </KeyGroup>
  <KeyGroup name="ZMAadmin">
    <Keys>
      <Key2File   name="ZMAadminCustomPanel"   filename="{AppConfigPath} ZMAadminPanel-WebHub-cv004.xml"/>
    </Keys>
  </KeyGroup>
</KeyGroups>
</ZMKeybox>
```

Key: **CentralInfo**
File: [WCHCentralInfo.xml](#)

This file is created automatically when you first run the WebHub Runtime installer. It defines your AppIDs.

```
<?xml version="1.0" encoding="UTF-8"?>
<?xmlstylesheet type="text/xsl" href="http://www.ZaphodsMap.com/zmdesign/css/ZaphodsMap.xsl"?>
<CentralInfo xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xsi:noNamespaceSchemaLocation="http://static.webhub.com/xsd/cv004/WebHubCentralInfo201512.xsd">
<Variables begin="{{$ end="}}>
  <Var name="AppPath" value="d:\Applications\HREFTools\WebHub\"/>      (( vars scoped to the XML file ))
</Variables>
<WebHubAppGroups>
  <WebHubAppGroup name="HREF Tools Standard">                      (( provided during installation ))
    <WebHubApps>
      <WebHubApp appID="appvers">
        <Nickname value="App version"/>
        <ConfigFolder value="{{$AppPath}}config\whcp\"/>
        <ConfigFilename value="WH AppConfig_appvers.xml"/>
        <ErrorLogFolder value="c:\temp\wherrorlogs\"/>
        <ShareSessions value="true"/>
        <ShareByFile value="true"/>
      </WebHubApp>
    </WebHubApps>
  </WebHubAppGroup>
  <WebHubAppGroup name="EarthWave Vinyl Record Store" >          (( the group name is arbitrary ))
    <WebHubApps>
      <WebHubApp appID="recstore" >                                (( appID must be lowercase ))
        <Active value="true" />
        <Nickname value="Record Store" />                            (( invent your own nickname ))
        <ConfigFolder value="c:\path\" />
        <ConfigFilename value="WH AppConfig_recstore.xml" />
        <ErrorLogFolder value="path\path2\" />
        <ShareSessions value="true" />
        <ShareByFile value="true"/>
        <SessionCookieName value="ewsession"/>                         (( can be ""))
        <SessionLocation value="CookieFixedDomain" />                  (( default value="URL"))
        <Deployment>
          <DefaultStartup mode="service"
            numToStartWithHub="3"
            stopWithHub="true" />
          <ExecutableFolder value="path\" />
          <ExecutableFilename value="recstore.exe" />
          <ServiceName value="recstore" />
          <Instances numToRunMinimum="2" numToRunMaximum="3" delaySecBetween="12" />
        </Deployment>
      </WebHubApp>
      <WebHubApp appID="rmisc" >
        <Nickname value="Stylus Department" />
        <ConfigFolder value="c:\path\" />
        <ConfigFilename value="WH AppConfig_rmisc.xml" />
        <ErrorLogFolder value="path\path2\" />
        <ShareSessions value="true" />
        <ShareByFile value="true"/>
        <SessionCookieName value="ewsession" />
        <SessionLocation value="CookieFixedDomain" />
        <Deployment>
```

```

<DefaultStartup mode="service"
    numToStartWithHub="1" stopWithHub="true" />
<ExecutableFolder value="path\" />
<ExecutableFilename value="rmisc.exe" />
<ServiceName value="rmisc" />
<Instances numToRunMinimum="1" numToRunMaximum="2" delaySecBetween="10" />
</Deployment>
</WebHubApp>

<WebHubApp appID="remoterecstore" >
    <Nickname value="Testing RecStore" />
    <ConfigFolder value="c:\path\" />
    <ConfigFilename value="WHAAppConfig_recstore" />
    <ErrorLogFolder value="c:\path\path2\" />
    <ShareSessions value="true" />
    <ShareByFile value="true"/>
    <Deployment>
        <DefaultStartup mode="application" numToStartWithHub="0" />
        <ExecutableFolder value="c:\path" />
        <ExecutableFilename value="recstore.exe" />
        <DebugMode value="true" />
        <Instances numToRunMinimum="1" numToRunMaximum="1" delaySecBetween="0" />
    </Deployment>
</WebHubApp>
</WebHubApps>
</WebHubAppGroup>
</WebHubAppGroups>
<HubProcess>
    <DefaultAppID value="appvers"/>
    <GuardianIntervalSeconds value="90" />
    <LogLevel value="warning,error,exception" /> (( v3.238+ ))
    <RandomNextInstance value="false" />
</HubProcess>
<Sessions>
    <SessionDebug value="False"/>
    <SessionDebugLogFile value="" />
    <SessionDigits value="10" />
    <SessionFileMask value="*.var" />
    <SessionFolder value="c:\temp\whSessions\" />
    <SessionLifeMinutes value="240" />
    <SessionPrefix value="0" />
    <SessionSweepIntervalMS value="120000" />
</Sessions>
<RunnerConfiguration>
    <RunnerTimeoutSec value="30" />
    <RunnerEchoEnabled value="True" />
</RunnerConfiguration>
<MaitreD>
    <RoundRobin appID="adv" serverProfileIDList="defprofile|secure|defprofile|demo" />
</MaitreD>
</CentralInfo>

```

File: [WHLicense.xml](#)

The WHLicense.xml file contains the name of the license owner, the expiration date (if any), and the serial number.

```
<?xml version="1.0" encoding="UTF-8"?>
<?xml-stylesheet type="text/xsl" href="http://www.ZaphodsMap.com/zmdesign/css/ZaphodsMap.xsl"?>
<WebHubLicense xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xsi:noNamespaceSchemaLocation="http://www.zaphodsmap.com/zmdesign/xsd/WebHubLicense200605.xsd">
<WebHubCentral>
<Licensee value="WebHub Lite License until 31-Dec-2016"/>
<SerialNo value="196.210.13.118.88.106.239.81.229.223.13.135"/>
</WebHubCentral>
</WebHubLicense>
```

File: WH AppConfig_AppID.xml

The AppID definitions within the CentralInfo file lead to this type of file, an application configuration file. There are two samples included with the WebHub Runtime System, and many examples available on demos.href.com. The example below is entirely fictitious. It includes *all possible* tags. Normal applications only need to configure a small subset of these tags.

For new WebHub applications, let the New AppID Wizard help you. This wizard is available in Delphi, under the menu: **Project > WebHub > New AppID**. It creates the XML file plus starter .whteko files.

```
<WebHubAppConfiguration xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xsi:noNamespaceSchemaLocation="http://static.webhub.com/xsd/cv004/WebHubAppConfiguration201601.xsd">
  <Startup>
    <MenuEnabled value="false" />
    <MenuEnabled value="true" context="home" />
    <SplashEnabled value="true" />
    <StartMinimized value="true" />
    <TrayIconEnabled value="true" />
    <Modules>
      <StandardModules>
        <GUIOptional>
          <Module name="dreamweaver" status="enabled" />
          <Module name="dreamweaver" status="enabled-gui" context="home"/>
          <Module name="dwsecurity" status="enabled-gui" />
          <Module name="email" status="enabled-gui" />
          <Module name="googlesitemap" status="disabled" /> // v3.246+
          <Module name="shareint" status="disabled" />
        </GUIOptional>
        <GUI>
          <Module name="appin" status="disabled" />
          <Module name="appout" status="enabled-gui" context="home"/>
          <Module name="decode" status="disabled" />
          <Module name="whteko" status="enabled-gui" />
        </GUI>
      </StandardModules>
      <CustomModules>
        <GUIOptional>
          <Module name="mydatamodule" status="enabled" />
        </GUIOptional>
        <GUI>
          <Module name="mypanel" status="enabled-gui" />
        </GUI>
      </CustomModules>
    </Modules>
  </Startup>
  <Application>
    <AppProperties>
      <DynURLConfig>
        <ServerProfileIDStandard value="iis" /> ((special case: (~APPID~) allowed))
        <ServerProfileIDSecure value="ssl(~APPID~)" />
        <ForceCase value="lower" />
        <UseAppID value="true" />
        <UseAppProcessID value="false" />
        <HideAppProcessID value="false" />
      </DynURLConfig>
      <ProjectSyntax value="0214" />
      <ProjectLingvo value="eng" />
    </AppProperties>
  </Application>
</WebHubAppConfiguration>
```

```

    </AppProperties>
    <AppSettings>
        <AppSetting name="custom1" value="unknown1" />
        <AppSetting name="custom2" value="unknown2" />
    </AppSettings>
    <ErrorAlertFlags>
        <ErrorAlertFlag name="Summary" value="true" />
        <ErrorAlertFlag name="Comment" value="true" />
        <ErrorAlertFlag name="LogToFile" value="true" />
        <ErrorAlertFlag name="Send" value="true" />
        <ErrorAlertFlag name="ShowPageCreationExceptions" value="false" />
    </ErrorAlertFlags>
    <ErrorSituations>
        <ErrorSituation name="RejectSession" logToFile="true" />
    </ErrorSituations>
    <EventMacros>
        <EventMacro id="getfield" groupCode="a" />
    </EventMacros>
    <MediaSources>
        <MediaSource id="1" value="(~chSimpleDNSAdvertisement~)" />
        <MediaSource id="2" value="(~chHREFAdvertisement~)" />
        <MediaSource id="3" value="(~chHREFRSUAd~)" />
    </MediaSources>
    <PageGeneration>
        <AutoPageFooter dropletName="None" />
        <AutoPageHeader dropletName="None" />
        <YesNoString value="Yes,No"/>
        <Syntax0100>
            <MacroPageBegin value="" />
            <MacroChunkBegin value="" />
            <MacroSectionBegin value="" />
            <MacroEndMarker value="" />
            <MacroEndBuffer value="" />
        </Syntax0100>
        <Sequencing> (( optional section ))
            <Up caption="up" activeImage="BtnUp.png" dimImage="GreyUp.png" />
            <Prior caption="prev"
                activeImage="(~mcSeqDir~)BtnPrev.png"
                dimImage="(~mcSeqDir~)GreyPrev.png" />
            <Next caption="next" activeImage="BtnNext.png" dimImage="GreyNext.png" />
            <Stop caption="stop" activeImage="BtnStop.png" dimImage="GreyStop.png" />
        </Sequencing>
    </PageGeneration>
    <RemoteDesignDefaultInterface>
        <AllowedSessionIDRange value="1200-1210"/>
        <RemoteAccessPages>
            <Page function="refresh" pageID="remoterefresh" />
            <Page function="design" pageID="remotedesign" />
            <Page function="preview" pageID="remotepreview" />
        </RemoteAccessPages >
        <AllowedIPRange value="192.168.3.*;10.10.3.3"/>
        <TestingServerURLPrefixMappedTo value="" />
    </RemoteDesignDefaultInterface>

```

```

<Security>
    <AdminSessionNumber value="12345678" />
    <CookieDomainDefault value="dsp.href.com" />      (( SessionLocation = CookieFixedDomain ))
    <ReadOnlySessionNumber value="12999" />
</Security>
<Situations>
    <AdminSideDoor      pageID="pgAdminSideDoor" />
    <ChangedIP          pageID="pgChangedIP" />        (( was BadIPPage ))
    <ChangedUserAgent   pageID="pgChangedUserAgent" />  (( was BadBrowserPage ))
    <Exception          pageID="pgError" />            (( new ))
    <FrontDoor          pageID="pgFrontDoor" />        (( was FrontDoor ))
    <Home               pageID="pgHome" />             (( was HomePage ))
    <Invalid            pageID="pgInvalid" />          (( was InvalidPage ))
    <InvalidDo          pageID="pgInvalidDo" />        (( was NoDoPage ))
</Situations>
<Static>
    <AppRoot value="/dspdesign/" />
    <ExportBackupGenerations value="3" />
    <ExportFolder value="path\" />
    <ExportURLPrefix value="/foo/" />                  (( was ExportDir ))
                                         (( was ExportURL ))
</Static>
<StreamCatcherInterface>
    <WebRobotIniFilespec
        value="c:\...\SCWebSiteConfig_wwwMySiteID.cfg" />
    <WebRobotIniSection value="wwwMySiteID.WebHubURLFiltering" />
</StreamCatcherInterface>
<TekoAutoFolders>
    <AutoFolder value="path\" />
    <AutoFolder value="path2\" />                      (( planned ))
</TekoAutoFolders>
<TekoFiles>
    <File id="about" filename="about.whteko" />
    <File id="ads" filename="dspads.whteko" />
    <File id="dsp" filename="dsp.whteko" />
    <File id="form" filename="form.whteko" />
    <File id="homepage" filename="home.whteko" />
    <File id="dreamweaver" filename="remotedw.whteko" />
    <File id="welcome" filename="welcome.whteko" />
    <File id="mirrors" filename="mirrors.whteko" />
    <File id="feedback" filename="feedback.whteko" />
</TekoFiles>
</Application>
<ComponentConfig>
    <whCycle componentName="WebCycle" > (( 'whCycle' equals the Family property of TwhActions ))
        <ItemList>
            <Item id="01" value="Delphi XE4 Book"/>
            <Item id="02" value="Delphi Component Design"/>
        </ItemList>
    </whCycle>
    <whdbForm componentName="dbform1">
        <FormatEditFields>
            <Item id="a" value="fieldname1"/>
        </FormatEditFields>
    </whdbForm>

```

```

<whdbScan componentName="scanEmployee">
    <Delimiters macroPrefix="mcEmployeeDelimiters" />
    <ButtonSpecs macroPrefix="mcEmployeeButtonSpecs" />
    <Captions macroPrefix="mcEmployeeCaptions" />
</whdbScan>
<whdbSource componentName="wdsEmployee">
    <KeyFields value="EmplNo" />
    <Arrangements>
        <Item id="ByName" value="idxLastname" />
    </Arrangements>
    <Prompts macroPrefix="mcPrompts" />
    <DisplaySets>
        <Item id="SimpleView" value="Lastname;Firstname;Telephone" />
    </DisplaySets>
    <IndexOrders>
        <Item id="ByName" value="idxLastname" />
    </IndexOrders>
</whdbSource>
<whErrors componentName="webErrors1">
    <ItemList>
        <Item errorNum="1" errorMessage="message 1" />
    </ItemList>
</whErrors>
<whListGrid componentName="listGrid1">
    <ItemList>
        <Item id="01" filename="datafile.txt" />
    </ItemList>
</whListGrid>
<whListScan componentName="listScan1">
    <Delimiters macroPrefix="mcDelims" />
    <ButtonSpecs macroPrefix="mcButtonSpecs" />
    <Captions macroPrefix="mcCaptions" />
</whListScan>
<whLogin componentName="webLogin">
    <ItemList>
        <User id="JDoe" fullName="John Doe" passPhrase="initials" password="jd"
              active="yes" expires="" access="" other="" />
    </ItemList>
</whLogin>

```

```

<whMailForm componentName="WebMailForm">
  <Item name="formLetter">
    <Host value="smtp.swiftdsl.com.au"/>
    <Port value="25"/>
    <SMTPUsername value="" />
    <SMTPPassword value="" />
    <From value="info@href.com"/>
    <Name value="Someone on the Web"/>
    <To value="EMailTo^"/>
    <Cc value="customerservice@href.com"/>
    <Bcc value="techsupport@href.com"/>
    <ReplyTo value="customerservice@href.com" />
    <Subject value="Subject^"/>
    <ExcludeStringVars value="telephone"/>
    <Include value="stringvars;boolvars"/>
    <Template value="letters\form-ltr.txt" />
    <Template value="letters\form-ltr.txt" context="office"/>
    <TxtVars value="txtComment" />
    <LogFile value="false"/>
    <LogFilespec value="" />
    <LogStringVars value="" />
    <NextPage value="" />
  </Item>
</whMailForm>
<whScanKeysGrid componentName="scankeysgrid1" > (( see Rubicon text search engine ))
  <ButtonSpecs macroPrefix="mcSpecs" />
  <Captions macroPrefix="mcSpecs" />
</whScanKeysGrid>
<whStringGrid componentName="stringgrid1" /> (( unused ))
<whWebAction componentName="webmailCaptcha">
  <Item id="LengthFull" value="18"/>
  <Item id="LengthKey" value="7"/>
</whWebAction>
<whWebAction componentName="mywebaction1"> (( for any webactions of family "whWebAction" ))
  <Item id="mysetting1" value="myvalue1" /> (( use for individual items ))
  <ItemList listName=""> (( use to treat entire list as a set ))
    <Item id="a" value="aaa" />
    <Item id="b" value="bbb" />
  </ItemList>
</whWebAction>
<Component name="aaa" > (( planned for use by any Delphi component ))
  <Item id="taaa" value="valueaaa" />
  <Item id="DatabaseAlias" value="DSP" context="home" />
  <Item id="DatabaseAlias" value="_DSP" context="office" />
  <ItemList listName="listaaaa">
    <Item id="a" value="aaa" />
    <Item id="b" value="bbb" />
  </ItemList>
</Component>
</ComponentConfig>
</WebHubAppConfiguration>

```

Correspondence between Standard Module names, Delphi unit names and Delphi classes

based on WebHubAppConfiguration200811.xsd

implemented by whcfg_App.pas, uAutoDataModules.pas and uAutoPanels.pas

Module	Name in Help/Docs	GUI	Delphi unit name	Delphi class name
dreamweaver	Dreamweaver	optional	whdw_RemotePages.pas (non-gui)	TDataModuleDreamWeaver
			whpanel_RemotePages.pas (gui)	TfmWhDreamweaver
dwsecurity	Dreamweaver Security	optional	whsample_DWSecurity.pas	TdmDWSecurity
email	EMail	optional	whMail.pas (non-gui)	TDataModuleWhMail
			whpanel_Mail.pas (gui)	TfmWebMail
shareint	Shared Refresh	optional	whShared.pas (non-gui)	TDataModuleShared
			whpanel_Shared (gui)	TfmCommon
appin	In/Out > Input	required	whAppIn.pas	TfmAppIn
appout	In/Out > Output	required	whAppOut.pas	TfmAppOut
decode	WHTeko > Decode	required	whpanel_Decode.pas	TfmWhHtmlDecoder
googlesitemap	Google Sitemap	required	whsample_GoogleSitemap.pas	TfmwhGoogleSitemap
whteko	WHTeko > Files	required	whHtml.pas	TfmAppHTML

Macro definitions associated with the <whdbScan_tag>

The following could be defined in one of the .whteko files associated with the application:

```
<whmacros>
mcEmployeeButtonSpecsFirst=<a href="(~where~)ScanEmployee.First">FIRST</a>
mcEmployeeButtonSpecsPrior=<a href="(~where~)ScanEmployee.Prior">PRIOR</a>
mcEmployeeButtonSpecsNext=<a href="(~where~)ScanEmployee.Next">NEXT</a>
mcEmployeeButtonSpecsLast=<a href="(~where~)ScanEmployee.Last">LAST</a>
mcEmployeeCaptionsFirst=FIRST
mcEmployeeCaptionsPrior=PRIOR
mcEmployeeCaptionsNext=NEXT
mcEmployeeCaptionsLast=LAST
mcPromptsArrangement=<b>Arrangement</b>;
mcPromptsIndexOrder=<b>Index Order</b>;
mcPromptsDisplaySet=<b>Display Set</b>;
mcPromptsFieldSet=<b>Field Set</b>;
</whmacros>
```

Key: ServiceControl
File: WHServiceControl.xml

```
<?xml version="1.0" encoding="UTF-8"?>
<?xml-stylesheet type="text/xsl" href="http://www.ZaphodsMap.com/zmdesign/css/ZaphodsMap.xsl"?>
<ServiceControl xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xsi:noNamespaceSchemaLocation="http://static.webhub.com/xsd/cv004/WebHubServiceControl200608.xsd">
    <Services>
        <Service id="firebird-sql-server" serviceName="fb" sequence="1" delaySecBefore="3"
            startWithHub="true" stopWithHub="true" context="HOME" />
        <Service id="ftp-server" serviceName="servudaemon" sequence="2" delaySecBefore="8"
            startWithHub="true" stopWithHub="false" />
    </Services>
</ServiceControl>
```

Key: CoverPageInfo
File: \CoverPageInfo\AppID\WHCoverPageInfo-AppID.xml

Cover pages appear when a WebHub application is "suspended" or intentionally closed. The contents of a cover page are specified through System Message configuration, with a few key details loaded from the following CoverPageInfo file.

A CoverPageInfo file can be generated using WebHubView.exe's menu: **Tools > Cover App**. It can also be generated from the AServer.exe interface, by toggling the Suspend feature. A function is provided in whutil_ZaphodsMap.pas.

```
<CoverPageInfo>
    <CoveredOnAt value="23-Jan-2015 01:02:03" /><!-- this is GMT -->
    <ExpectedMinutes value="15" />
    <Reason value="database structure upgrade" />
    <AdminAccessAllowed value="true" />
</CoverPageInfo>
```

WebHub v3.15x Runner query strings

?r:vers, to show the version number or '-' if disallowed
?r:version, to confirm that the runner has a valid runner id from WHNetworkInfo.xml
?r:ipc, to show 'x' for cross-platform or '-' if disallowed
?r:echo, including display of configuration details when running on localhost or on the admin domain
?r:refresh, to reload all configuration data
?r:coverwhapp- + AppID, to say look for downtime file for AppID
?r:uncoverwhapp- + AppID, to say look for (lack of) downtime file for AppID
?h:vers, to show the version number of the Hub if it is running, or '-' if disallowed
?h:ipc, to show the ipc of the Hub (which must match the runner), or '-' if disallowed
?h:nct, to show number of connected instances, total, or '-' if disallowed
?h:hca- + AppID, to show the number of connected instances for AppID, or '-' if disallowed

Key: SystemMessages
File: WHSystemMessages.xml

This file is installed with the WebHub Runtime System, along with a starter set of .whmsg files.

```
<SystemMessages xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xsi:noNamespaceSchemaLocation="http://static.webhub.com/xsd/cv004/WebHubSystemMessages201307.xsd">
<Variables begin="{" end="}">
<Var name="SysMsgRoot" value="c:\Program Files\HREFTools\WebHub\config\sysmsg"/>
</Variables>
<Situations>
<AllSituationsDefault appID="adv" value="{SysMsgRoot}advgeneral.whmsg" />
<AppCoverPage appID="" value="/AppCoverPage.html" />
<AppCoverPage appID="appvers" value="{SysMsgRoot}appcoverpage-appvers.whmsg.html" />
<AppCoverPage appID="hubvers" value="{SysMsgRoot}appcoverpage-hubvers.whmsg.html" />
<AppIDBusy appID="" value="{SysMsgRoot}appidbusy.whmsg" />
<AppNotDefined appID="" value="{SysMsgRoot}appnotdefined.whmsg" />
<AppNotRunning appID="" value="{SysMsgRoot}appnotrunning.whmsg" />
<AppShuttingdown appID="" value="http://webhub.com/appshuttingdown.html" />
<HubNotFound appID="" value="{SysMsgRoot}hubnotfound.whmsg" />
<RequestTimeout appID="" value="{SysMsgRoot}requesttimeout.whmsg" />
</Situations>
<MsgContentTypes>
<MsgContentType appID="" value="text/html" />
(( new in WebHub v3.192 ))
<MsgContentType appID="bw" value="text/xml" />
<MsgContentType appID="demos" value="text/json" />
</MsgContentTypes>
<MsgContentTypeOverrides>
<Override id="a1" pageIDMatch="pgxml" whmsgSuffix="xml" contentType="application/xml" />
<Override id="a2" pageIDMatch="xml" whmsgSuffix="xml" contentType="application/xml" />
<Override id="aa" pageIDMatch="ajax" whmsgSuffix="ajax" contentType="text/html" />
<Override id="bb" pageIDMatch="json" whmsgSuffix="json" contentType="application/json" />
</MsgContentTypeOverrides>
<Text>
<AppCoverPage value="temporary admin mode" />
<AppIDBusy value="application busy" />
<AppNotDefined value="invalid AppID" />
<AppNotRunning value="app not running" />
<AppShuttingDown value="app in process of shutting down" />
<HubNotFound value="hub.exe not running or not available" />
<Minutes value="minutes" />
<RequestTimeout value="request timeout" />
</Text>
</SystemMessages>
```

Key: NetworkInfo
File: WHNetworkInfo.xml

This configuration file needs to be set up carefully for each deployment machine. It identifies the WebHub runner(s) and associates them with an http server (e.g. IIS, Apache or Sambar) and a mode of operation (e.g. with StreamCatcher).

```
<?xml version="1.0" encoding="UTF-8"?>
<?xmlstylesheet type="text/xsl" href="http://www.ZaphodsMap.com/zmdesign/css/ZaphodsMap.xsl"?>
<WebHubNetworkInfo xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xsi:noNamespaceSchemaLocation="http://static.webhub.com/xsd/cv004/WebHubNetworkInfo201511.xsd">
<HttpServers>
    <HttpServer id="apache" nameStartsWith="Apache"
        sendHttpVersion="false" sendHttpColon="false" httpForceCase="upper" /> (( was HttpColon and UseHttpHeader ))
    <HttpServer id="iis" nameStartsWith="Microsoft IIS 6"
        sendHttpVersion="true" sendHttpColon="true" httpForceCase="upper" />
    <HttpServer id="iis" nameStartsWith="SAMBAR"
        sendHttpVersion="true" sendHttpColon="true" httpForceCase="upper" />
</HttpServers>
<LocalMachine>
    <ConnectionLayer>
        <SharedLogFolder value="d:\temp\whTestLogs\" />
        <WorkingFolder value="e:\temp\ipc\" />
    </ConnectionLayer>
    <Runners>
        <Runner id="a" filespec="c:\inetpub\scripts\runisa.dll" >
            <Active value="true" />
            <Interface value="isapi" />
            <DelayMS value="50" />
            <UploadFolder value="c:\temp\" />
            <ErrorLogFolder value="c:\temp\" />
            <UploadMaxFileSizeKB value="100" />
            <AdminAccess scheme="http" authority="admin.href.com:443" />
        </Runner>
        <Runner id="b" filespec="c:\htdocs\cgi-bin\runbin.exe" >
            <Interface value="cgi-bin" />
            <DelayMS value="0" />
            <UploadFolder value="c:\temp\" />
            <ErrorLogFolder value="c:\temp\" />
            <AdminAccess scheme="http" authority="localhost:80" />
            <ForcesThisAppID value="adv" />
        </Runner>
    </Runners>
</LocalMachine>
```

```

<ServerProfiles>
    <ServerProfile id="defprofile">
        <HttpServerID value="iis" />
        <Scheme value="http" />
        <Authority value="www.href.com:80" />
        <AllowDynamicAuthority value="true" />
        <RunnerPath value="scripts/" />
        <RunnerID="a" />
        <URLUseShortFormat value="false" />
        <URLDelimiter value=":" />
        <URLForceCase value="upper" />
        <URLUseLingvo value="false" />
        <URLUseScheme value="false" />
    </ServerProfile>
    <ServerProfile id="secure">
        <HttpServer value="iis" />
        <Scheme value="https" />
        <Authority value="www.href.com:443" />
        <AllowDynamicAuthority value="false" /> // generally false on https
        <RunnerPath value="scripts/" />
        <RunnerID value="a" />
        <URLUseShortFormat value="True" />
        <URLDelimiter value="/" />
        <URLUseLingvo value="true" />
        <URLUseScheme value="false" />
    </ServerProfile>
</ServerProfiles>
</LocalMachine>
<OtherMachines>
    <ServerProfiles>
        <ServerProfile id="securehref" >
            <HttpServerID value="iis" />
            <Scheme value="http" />
            <Authority value="secure.href.com:80" />
            <URLRunnerSpec value="/scripts/runisa.dll" />
            <URLUseShortFormat value="true" />
            <URLDelimiter value=":" />
            <URLUseLingvo value="false" />
        </ServerProfile>
    </ServerProfiles>
</OtherMachines>
</WebHubNetworkInfo>

```