

Announcement

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Create Excel Files From SQL (Via Business Operation)

This Utility creates an xlsx file with the file name provided.

There are mutiple ways to write data to it, I am retrieving it via Sql queries in this example.

```
Include %occFile Class Utils.XLSX
```

```
{
ClassMethod DateTime() As %String [ CodeMode = expression ]
{
$TR($ZDateTime($H,3),"- :")
}
}
```

```
ClassMethod GenerateXLSX(
IsActive As %Boolean,
Output FileName As %String) As %Status
{
```

```
Set stream = ##class(%Stream.FileCharacter).%New()
Set tmpFile = ##class(%File).TempFilename("xls") If (IsActive) {
```

```
s lufFileName="Test".. DateTime()
Set tmpFile = ##class(%File).GetDirectory(tmpFile)_lufFileName_".xls"
If (##class(%File).Exists(tmpFile)){
do ##class(%File).Delete(tmpFile)
}
}
```

```
Set FileName = tmpFile
Set sc = stream.LinkToFile(tmpFile) //Fetch Table Colors
#dim headerBgColor = ##class(Ens.Util.FunctionSet).Lookup("Weekly Report Colors", "Header BG Color")
#dim headerFontSize = ##class(Ens.Util.FunctionSet).Lookup("Weekly Report Colors", "Header Font Size")
#dim headerDateFontSize = ##class(Ens.Util.FunctionSet).Lookup("Weekly Report Colors", "Header Date Font Size")
#dim headingsBgColor = ##class(Ens.Util.FunctionSet).Lookup("Weekly Report Colors", "Headings BG Color")
#dim headingsFontSize = ##class(Ens.Util.FunctionSet).Lookup("Weekly Report Colors", "Headings Font Size")
```

```
#dim reportFontSize = ##class(Ens.Util.FunctionSet).Lookup("Weekly Report Colors", "Report Font Size")
```

```
do stream.WriteLine("<html xmlns:o='\"urn:schemas-microsoft-com:office:office\"'")
do stream.WriteLine("xmlns:x='\"urn:schemas-microsoft-com:office:excel\"'")
do stream.WriteLine("xmlns='\"http://www.w3.org/TR/REC-html40\"'>")
do stream.WriteLine("<head>")
do stream.WriteLine("<meta http-equiv=Content-Type content='\"text/html; charset=windows-1252\"'>")
do stream.WriteLine("<meta name=ProgId content=Excel.Sheet>")
do stream.WriteLine("<meta name=Generator content='\"Microsoft Excel 11\"'>") //do stream.WriteLine("Content-Type: application/msexcel")
//do stream.WriteLine("Content-Disposition: attachment; filename=REPORT.xls")
do stream.WriteLine("<!--[if gte mso 9]><xml>")
do stream.WriteLine("<x:excelworkbook>")
do stream.WriteLine("<x:excelworksheets>")
do stream.WriteLine("<x:excelworksheet>")
do stream.WriteLine("<x:name>Restart Team Work Hours Report</x:name>")
```

```

do stream.WriteLine("<x:worksheetoptions>")
do stream.WriteLine("<x:selected></x:selected>")
do stream.WriteLine("<x:freezepanes>3</x:freezepanes>")
do stream.WriteLine("<x:frozensplit></x:frozensplit>")
do stream.WriteLine("<x:splithorizontal>3</x:splithorizontal>")
do stream.WriteLine("<x:toprowbottompane>3</x:toprowbottompane>")
do stream.WriteLine("<x:splitvertical></x:splitvertical>")
do stream.WriteLine("<x:leftcolumnrightpane></x:leftcolumnrightpane>")
do stream.WriteLine("<x:activepane></x:activepane>")
do stream.WriteLine("<x:panes>")
do stream.WriteLine("<x:pane><x:number>3</x:number></x:pane>")
do stream.WriteLine("<x:pane><x:number>1</x:number></x:pane>")
do stream.WriteLine("<x:pane><x:number>2</x:number></x:pane>")
do stream.WriteLine("<x:pane><x:number>0</x:number></x:pane>")
do stream.WriteLine("</x:panes>")

do stream.WriteLine("<x:protectcontents>False</x:protectcontents>")
do stream.WriteLine("<x:protectobjects>False</x:protectobjects>")
do stream.WriteLine("<x:protectscenarios>False</x:protectscenarios>")
do stream.WriteLine("</x:worksheetoptions>")
do stream.WriteLine("</x:excelworksheet>")
do stream.WriteLine("</x:excelworksheets>")
do stream.WriteLine("<x:protectstructure>False</x:protectstructure>")
do stream.WriteLine("<x:protectwindows>False</x:protectwindows>")
do stream.WriteLine("</x:excelworkbook>")
do stream.WriteLine("</xml><![endif]->")
do stream.WriteLine("</head>")
do stream.WriteLine("<body>") do stream.WriteLine("<table border='\"1\"' width='\"100%\"' style='\"align:left; table-
layout: auto\">") //Row Title
do stream.WriteLine("<thead>")
do stream.WriteLine("<tr bgcolor='\"_headerBgColor_\">")
do stream.WriteLine("<th colspan=11 align='\"left\"><b><font color='\"_fontColor_\"'")
size='\"_headerFontSize_\">"_weeklyReportTitle_"</font></b></th>")
do stream.WriteLine("<th colspan=7 align='\"right\"><b><font color='\"_fontColor_\"'")
size='\"_headerDateFontSize_\">"_SZDT($H,5)_"</font></b></th>")
do stream.WriteLine("</tr>") //Row 3
do stream.WriteLine("<tr bgcolor='\"_headingsBgColor_\">")
do stream.WriteLine("<th colspan='\"3\"><b><font color='\"_fontColor_\"'")
size='\"_headingsFontSize_\">Project</font></b></th>")
do stream.WriteLine("<th><b><font color='\"_fontColor_\"' size='\"_headingsFontSize_\">Milestones</font></b></th>")
do stream.WriteLine("<th><b><font color='\"_fontColor_\"' size='\"_headingsFontSize_\">Tasks</font></b></th>")
do stream.WriteLine("<th><b><font color='\"_fontColor_\"' size='\"_headingsFontSize_\">Estimated</font></b></th>")
do stream.WriteLine("<th><b><font color='\"_fontColor_\"' size='\"_headingsFontSize_\">Logged</font></b></th>")
do stream.WriteLine("<th><b><font color='\"_fontColor_\"' size='\"_headingsFontSize_\">Progress</font></b></th>")
do stream.WriteLine("<th><b><font color='\"_fontColor_\"' size='\"_headingsFontSize_\">Created")
On</font></b></th>")
do stream.WriteLine("<th><b><font color='\"_fontColor_\"' size='\"_headingsFontSize_\">Last")
Logged</font></b></th>")
do stream.WriteLine("<th><b><font color='\"_fontColor_\"' size='\"_headingsFontSize_\">Value</font></b></th>")
do stream.WriteLine("<th><b><font color='\"_fontColor_\"' size='\"_headingsFontSize_\">Average</font></b></th>")
do stream.WriteLine("<th><b><font color='\"_fontColor_\"' size='\"_headingsFontSize_\">Cost</font></b></th>")
do stream.WriteLine("<th><b><font color='\"_fontColor_\"' size='\"_headingsFontSize_\">Profit</font></b></th>")
do stream.WriteLine("<th><b><font color='\"_fontColor_\"' size='\"_headingsFontSize_\">25%</font></b></th>")
do stream.WriteLine("<th><b><font color='\"_fontColor_\"' size='\"_headingsFontSize_\">50%</font></b></th>")
do stream.WriteLine("<th><b><font color='\"_fontColor_\"' size='\"_headingsFontSize_\">75%</font></b></th>")
do stream.WriteLine("<th><b><font color='\"_fontColor_\"' size='\"_headingsFontSize_\">100%</font></b></th>")
do stream.WriteLine("</tr>")
do stream.WriteLine("</thead>")

```

```

Set sqlStatement = " QUERY"

Set query = ##class(%ResultSet).%New()
Set sc = query.Prepare(sqlStatement)
Set:sc sc = query.Execute()
quit:'sc sc while query.Next() {

do stream.WriteLine("<tr bgcolor="" _accountNameBgColor_ "">")
do stream.WriteLine("<td colspan=""18""><b><font color="" _accountNameFontColor_ ""
size="" _accountNameFontSize_ "">" _query.Get("AccountName") _"</font></b></td>") do stream.WriteLine("</tr>")
//Row 2
do stream.WriteLine("<tr bgcolor="" _projectHeadingBgColor_ "">")
do stream.WriteLine("<td colspan=""2"" align=""left""><b><font color="" _fontColor_ ""
size="" _projectHeadingFontSize_ "">" _query.Get("ProjectId") _"</font></b></td>")
do stream.WriteLine("<td colspan=""6""><b><font color="" _fontColor_ ""
size="" _projectHeadingFontSize_ "">" _query.Get("ProjectName") _"</font></b></td>")
do stream.WriteLine("<td><b><font color="" _fontColor_ ""
size="" _projectHeadingFontSize_ "">" _$ZDT(query.Get("DateCreated"),3) _"</font></b></td>")
do stream.WriteLine("<td><b><font color="" _fontColor_ "" size="" _projectHeadingFontSize_ "">£
_ $FNumber(query.Get("ProjectValue"),",",0) _"</font></b></td>")
do stream.WriteLine("<td><b><font color="" _fontColor_ "" size="" _projectHeadingFontSize_ "">£
_ $FNumber(##class(Restart.Data.TeamworkWeeklyReportUsers).GetAverageUserRate(query.Get(
"ProjectId")),",",2) _"</font></b></td>")
do stream.WriteLine("<td><b><font color="" _fontColor_ "" size="" _projectHeadingFontSize_ "">£
_ $FNumber(ProjectCost,",",2) _"</font></b></td>")
If (ProjectProfit = 0) {
do stream.WriteLine("<td><b><font color="" _fontColor_ "" size="" _projectHeadingFontSize_ "">£ 0</font></b></td>")
} Else {
do stream.WriteLine("<td><b><font color="" _fontColor_ "" size="" _projectHeadingFontSize_ "">£
_ $FNumber(ProjectProfit,",",2) _"</font></b></td>")
}
do stream.WriteLine("<td></td>")
do stream.WriteLine("<td></td>")
do stream.WriteLine("<td></td>")
do stream.WriteLine("<td></td>")
do stream.WriteLine("<td></td>")
do stream.WriteLine("<td></td>")
do stream.WriteLine("</tr>") //STEP 2

do stream.WriteLine("</tr>") Do stream.WriteLine("</table>") do stream.WriteLine("</body>")
do stream.WriteLine("</html>")
Set sc = stream.%Save() Quit sc
}}

```

[#ZEN #Ensemble](#)

Source URL: <https://community.intersystems.com/post/create-excel-files-sql-business-operation>