

Rootana Webdisplay, Documentation

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Rootana webdisplay

- Developed webdisplay for looking at rootana ROOT plots online.
 - Actually nothing to do really with rootana; will work with any program with ROOT plots (with newer ROOT).
 - My display is not so fancy; think of it as more of a starting point.
- There is also an even simpler web display provided by ROOT
 - The simpler display may work in many cases
 - I'll show the benefits of either.

Setup ROOT with httpserver

- Make sure your copy of root is compiled with THttpServer support.
 - 'root-config --has-http' should return 'yes'
- Start THttpServer in your C++ program
 - `THttpServer *serv = new THttpServer(8088); // or port of your choice`
- Open webbrowser, check out server at <http://localhost:8088>

Rootana webdisplay setup

- Setup apache proxy so that mhttpd and root browser are on same port.
 - Konstantin points out root web browser should support CORS requests; haven't checked this.
- Edit ODB to a custom midas page
 - /Custom/Path =
/home/lindner/packages/rootana/examples/html/
/Custom/webdisplay= generic_webdisplay.html
- Modify the file generic_rootana_setup.json to point to the histograms you have made

```
[thomass-mbp-2:html lindner$ more generic_rootana_setup.json
{
  "V792" : {
    "MaxChannels" : 32,
    "WebserverName" : "V792_0"
  },
  "V1720" : {
    "MaxChannels" : 8,
    "WebserverName" : "V1720"
  },
  "V1720 Correlations" : {
    "MaxChannels" : 8,
    "WebserverName" : "V1720_Correlations"
  },
  "V1720 Comparison" : {
    "MaxChannels" : 1,
    "WebserverName" : {"Pulse Height Comparison" : "V1720PHCompare",
                       "Time Comparison" : "V1720TimeCompare"}
  },
  "V1720 Pulse Height Comparison" : {
    "MaxChannels" : 1,
    "WebserverName" : "V1720PHCompare"
  }
}
```

ROOT names



Example

Default ROOT webpage

<https://midastestdaq.triumf.ca/rootana/>

(username, password =

Rootana webdisplay page

<https://midastestdaq.triumf.ca/CS/webdisplay>

Configuration file

https://midastestdaq.triumf.ca/CS/generic_rootana_setup.json

Benefits

- Default ROOT webdisplay:
 - Easier to setup
 - Supports more plotting types now (like canvases)
- Rootana webdisplay
 - Easier to arrange your different histograms, hide un-interesting histograms
 - Can better support custom call-backs to the ROOT program (like resetting histograms).

Documentation

- Main MIDAS documentation
 - https://midas.triumf.ca/MidasWiki/index.php/Main_Page
- Some known gaps in information
 - No db_watch description
- Some known duplications
 - Different instructions for setting up MIDAS
- Another problem: Wiki usually describes the HEAD version of MIDAS
 - How to provide documentation for MIDAS from 5 years ago?
- Feedback welcome (though this is always work that is hard to find time for); send problematic documentation to lindner@triumf.ca