QGIS Application - Feature request #10764
Python API to handle layer groups without iface

2014-07-01 02:53 AM - David AMAR

Status:	Closed		
Priority:	Normal		
Assignee:			
Category:			
Pull Request or Patch supplied:	No	**Resolution:**	fixed/implemented
Easy fix?:	No	**Copied to github as #:**	19147

Description

My intent is to automate production of raster files to use QgisMapServer as a WMS Server.
In order to manage it, I use a stand-alone python script (without GUI) to handle QGS project files. See attached file modifyqgs.py.

Up to now, I am able to add raster layers to an existing project using QgsMapLayerRegistry.

Now, I want to organize layers using groups but I didn't find any API to acheive it using "headless" API - that is without qgis.utils.iface.legendInterface() component. Still undocumented QgsLayerTreeGroup used by QgsProject may be a future solution?

Regards.

History

#1 - 2014-07-01 07:04 PM - Martin Dobias

- Resolution set to fixed/implemented

- Status changed from Open to Closed

The QgsLayerTree* classes are exactly what you are looking for. Please see the doxygen documentation of the classes (especially QgsLayerTreeNode, QgsLayerTreeLayer, QgsLayerTreeGroup). I will add some more documentation to PyQGIS cookbook later. For now, your entry point is QgsProject.instance().layerTreeRoot() - from there you can start adding child groups and layers.

#2 - 2014-07-02 02:00 AM - David AMAR

Thank you Martin.

I have just tried these classes and I think there are some points to fix if you confirm them:
- QgsLayerTreeNode, QgsLayerTreeLayer, QgsLayerTreeGroup documentation is not generated by doxygen in official documentation http://qgis.org/api/2.4.

- When I try 'print QgsProject.instance().layerTreeRoot().dump()' in a stand-alone python script, I only see GROUP nodes. Same command in Python Console in QGIS Desktop displays GROUP and LAYER nodes.
Ex:
Results in stand-alone script

GROUP: visible=2 expanded=1
  GROUP: myGroup visible=2 expanded=1

Results in Python Console

GROUP: visible=2 expanded=1
 GROUP: myGroup visible=2 expanded=1
  LAYER: myRaster visible=2 expanded=1 id=myRaster20140702045512566

Best Regards.

Files

modifyqgs.py	1.75 KB	2014-07-01	David AMAR