

HYDROMET PORTAL SAINT-LUCIA

Uploading DATA to the platform

Wednesday 29th

Module objective: uploading data into the platform.



ENTERING SAINT LUCIA PLATFORM

Access to the platform:

http://10.137.8.14/apps/dewetra2/index_mydewetra.html

USEFUL TOOLS: WINSCP and QGIS

UPLOADING (STATIC) DATA



GEOSERVER

Access to the geoserver:

http://10.137.8.14/dds/web/

USEFUL TOOLS: WINSCP and QGIS

CREATING THE WMS ON THE GEOSERVER

- 1. UPLOADING THE DATUM IN THE SERVER
- 2. CREATE NEW STORE
- 3. PUBLISHING THE LAYER
- 4. CREATE AND CHANGE STYLE, IF NEEDED

🍈 GeoServe	er		Logged in as admin.
Ŭ	Welcome		
About & Status	Welcome		
 GeoServer Logs Contact Information About GeoServer 	This GeoServer belongs to).	Service Capabilities
Process status	60 Layers	Add layers	WCS 1.1.0
Data	33 Stores	Add stores	1.1.1
Layer Preview Workspaces	3 Workspaces	 Create workspaces 	1.1 2.0.1 1.0.0
 Stores Layers Layer Groups Styles 	Please read the file se security risk.	curity/masterpw.info and remove it afterwards. This file is a	WFS 1.0.0 1.1.0 2.0.0
Somicor	— A The default user/grou	p service should use digest password encoding.	WMS
WCS A No strong cryptogra		y available, installation of the unrestricted policy jar files is	1.1.1 1.3.0 WPS
Ling WMTS Ling WFS Ling WPS	This GeoServer instance is administrator.	s running version 2.11.2 . For more information please contact the	1.0.0 TMS 1.0.0
Settings			WMS-C
Global			1.1.1 MATE
Image Processing Raster Access			1.0.0
Tile Caching			

- Tile Layers
- Gridsets

Connect via SFTP using WinSCP (for instance):

10.137.8.14

Copy the file from local computer to the server, in the folder:

data/upload/training

Use your initials as file suffix.

强 Administra	tor - Adm	inistrator@172.	17.40.91 - WinSCP				-		×
Local Mark Files	Command	ls Session Option	is Remote Help						
🖶 💦 📚 Synch	nronize 🗾	1 🖉 💽 🚳	🗿 Queue 👻 🛛 Tran	sfer Settings Default		- 🥩 -			
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C:\Users\AlexejW\				/usr/home/Adminis	trator/				
Name	Size	Туре	Changed	Name	Size	Changed		F	Rights
<u>t.</u>		Parent directory	11.09.2018 08:23:47	🔁 💭		11.09.2018 1	5:51:33	r	wxr-xr-x
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🛅 Contacts								~	
🔚 Desktop		Login				_		^	
📑 Documents		New Site		Session					
其 Downloads		Administrato	r@172.17.40.91	File protocol:					
🛼 Favorites		root@172.1	7.40.11	SFTP					
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b Music				10 137 8 1	14 —		rt number:		
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		Tools	✓ Manage ▼	Logir		Close	Help		

STEP 2.1 : CREATE A NEW STORE

GeoServer				Logged in	as admin. El Logout
About & Status	Stores				
 Server Status GeoServer Logs Contact Information 	 Add new Store Remove selected Store 	ores			
About GeoServer	<< < 1 > >>	Results 1 to 2 (out of 2	2 items)	🔍 Search	
🔅 Process status	Data Type	Workspace	Store Name	Туре	Enabled?
Data		dewetra	LCA_Streams_WGS84	Shapefile	4
 Layer Preview Workspaces Stores Layers Layer Groups Styles 		dewetra Results 1 to 2 (out of 2 	LCA_topo_wgs84_cog 2 items)	GeoTIFF	~
Services WMTS WMS WCS WFS WPS					

STEP 2.3 : UPLOADING DATA

🍈 GeoServer	Logged in as admin.
~	New data source
About & Status	Choose the type of data source you wish to configure
GeoServer Logs Contact Information	Vector Data Sources
Process status	CSV - Comma delimited text file Directory of spatial files (shapefiles) - Takes a directory of shapefiles and exposes it as a data store
Data Layer Preview Workspaces	GeoPackage - GeoPackage PostGIS - PostGIS Database PostGIS (JNDI) - PostGIS Database (JNDI) PostGIS (JNDI) - PostGIS Database (JNDI)
 Stores Layers Layer Groups Styles 	Shapefile - ESRI(tm) Shapefiles (*.shp) web Feature Server (NG) - Provides access to the Features published a Web Feature Service, and the ability to perform transactions on the server (when supported / allowed).
Services	Raster Data Sources
WMTS WMS WCS WFS WPS	ArcGrid - ARC/INFO ASCII GRID Coverage Format GeoDeckees (massic), CooDeckees messic alusin GeoTIFF - Tagged Image File Format with Geographic information ImageMosaic - Image mosaicking plugin
Settings	WorldImage - A raster file accompanied by a spatial data file
Global Image Processing	Other Data Sources
Raster Access	In the second se

Connect via SFTP using WinSCP (for instance):

10.137.8.14

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data/upload/training

Use your initials as file suffix.

强 Administra	tor - Adm	inistrator@172.	17.40.91 - WinSCP				-		×
Local Mark Files	Command	ls Session Option	is Remote Help						
🖶 💦 📚 Synch	nronize 🗾	1 🖉 💽 🚳	🗿 Queue 👻 🛛 Tran	sfer Settings Default		- 🥩 -			
📮 Administrator@		1 💣 New Session	n						
C: System	- 督	🔽 🖻 🗖 🍙	2 🔒 🖛 - 🔶	- 📔 Aci - 🚰 🔽		- 12 7	î 2 🛛), Fin	d Files 🛛 🕄 📥
Upload 👻 🕅	Edit - 🗙	Propertie	s » + - 1	🖌 👔 Download 👻	🖉 Edit 👻	🗙 🛃 🕞 Р	roperties	>>	> + >
C:\Users\AlexejW\				/usr/home/Adminis	trator/				
Name	Size	Туре	Changed	Name	Size	Changed		F	Rights
<u>t.</u>		Parent directory	11.09.2018 08:23:47	🔁 💭		11.09.2018 1	5:51:33	r	wxr-xr-x
.VirtualBox		Dateiordner	13.09.2018 09:39:29					-	
🛅 Contacts								~	
🔚 Desktop		Login				_		^	
📑 Documents		New Site		Session					
其 Downloads		Administrato	r@172.17.40.91	File protocol:					
🛼 Favorites		root@172.1	7.40.11	SFTP					
凄 Links						D-		- 1	
b Music				10 137 8 1	14 —		rt number:		
E Pictures				10.137.0.1			2	<u> </u>	
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		Tools	✓ Manage ▼	Logir		Close	Help		

STEP 2.3 : CREATING A NEW STORE

A Castania		Logged in as admin.	Logout
Geoserve	l contraction de la contractio	Shapefile location	×
		Data directory 🗠 data/ cima/	
	New Vector Data Source	Name	Last modified Size
About & Status	Add a new vector data source	LCA_AdminLvl1_WGS84.shp	Jun 29, 2015 2:19 PM 82.5K
👗 Server Status		LCA Aspect_WGS84.shp	Aug 6, 2015 2:03 PM 17.2M
GeoServer Logs	Shapefile	LCA_DrainageBasins_WGS84.shp	Jul 20, 2015 3:00 PM 139K
Contact Information	ESRI(tm) Shapefiles (*.shp)	LCA_HydrometStations.shp	Mar 28, 2023 6:00 PM 1.9K
About GeoServer	Basic Store Info	LCA_Streams_WGS84.shp	Mar 28, 2023 4:29 PM 428.4K
Process status	Workspace *	streamstm_EPSG2006.shp	Jun 1, 2017 6:48 PM 428.4K
Data	demater		
set name and	Data Source Name *		
description (no			
Jeschiption (no	Description		
SDACesa)er Groups			
Styles	M Enabled		
Services	Connection Parameters	l l	
WMTS	Shapefile location *		
wms	file:data/example.extension	Browse	Browse for the fill
wcs	DBF charset		
WFS	ISO-8859-1 ×		
WPS			
Settings	Create spatial index if missing/outdated		
Global	Use memory mapped buffers (Disable on Windows)		
Image Processing			
Raster Access	Cache and reuse memory maps (Requires 'Use Memory mapped	buffers' to be enabled)	
Tile Caching	Save Apply Cancel		
Tile Lavers			



STEP 3 : PUBLISHING DATA

About & Status Server Status GeoServer Logs Contact Inform About GeoServe Process status	s ation er	New Layer Add a new layer You can create a new fe Here is a list of resource	eature type by manually configuring the attributes contained in the store 'LCA_HydrometStation'	Ite names and types. Create new ns'. Click on the layer you wish to c	feature type onfigure
 Process status Data Layer Preview Workspaces Stores Layers Layer Groups Styles 	Edit Layer Edit layer data and publ dewetra:LCC Configure the resource a Data Publishin Edit Layer Basic Resource In Store Name: LCA Name LCA_HydrometStations Enabled Advertised Title LCA_HydrometStations Abstract	Image: Contract of the second seco		Style	Action Publish 1. 2.
	Save Apply	Cancel			

. Check Coordinate System

2. Compute Bounding Box from data / native bounds

STEP 4 : ADD STYLE

Logged in as admin. E Logout GeoServer **Styles** About & Status Styles published by GeoServer Server Status Add a new style GeoServer Logs Contact Information Type a new style definition, or use an existing one as a template, or upload a ready made style from your file system. The editor can < 1 > >> Results 1 to 6 (out of Server Status provide syntax highlighting and automatic formatting. Click on the "validate" button to verify the style is a valid style document. About GeoServer << GeoServer Logs 5.0 04 Process status Contact Information Data Style Name About GeoServer Process status Style Data Legend Data generic Name Legend Data Add legend Layer Preview Laver Preview line Workspaces Workspace Preview legend Workspaces Stores . Stores point Layers Format Laver Groups SLD . Layers Styles polygon **Style Content** Laver Groups Services Upload style, created with QGIS Generate a default style Styles raster WMTS Sceglierne uno 🔻 Generate ... WMS WCS (SLD format) Copy from existing style style_LCA_streams • Services WFS Sceglierne uno WPS Copy ... < 1 > >> Results 1 to 6 (out of 6 WMTS << Settings DIDALE A SUVICE WMS Choose file No file chosen Upload ... Global WCS Image Processing Raster Access WFS Font 12pt ~ Height 300px ~ 2 6 3 王 a a 'a 🔤 **Tile Caching** WPS Tile Layers Caching Defaults Settings Gridsets Bisk Quota Global BlobStores Validate Save Apply Cancel Image Processing Raster Access



Logged in as admin. 🙍 Logout

STEP 4 : ADD STYLE

Edit Layer

About & Status

Server Status

GeoServer Logs

Contact Information

About GeoServer

Process status

Data

💹 Layer Preview

Workspaces

Layers

Styles

Services

100

Publishing Data

Edit layer data and publishing

dewetra:LCA_Streams_WGS84

Configure the resource and publishing information for the current layer

Dimensions

Tile Caching Security

HTTP Settings

Caching Settings Response Cache Headers

Cache Time (seconds)

Root Layer in Capabilities:

WMS Setting	S		
Queryable			
Opaque			
Default Style			
line	•		
1			
Additional Styles			
	Available Styles	⇒	Selected Styles
generic line point polygon raster		¢	ewetra:style_LCA_streams
Dafault Pandering R	uffor		
Save Apply	Cancel		

DJANGO

Access to Django:

http://10.137.8.14/admin/



Logged in as admin. 🗧 Logout

STEP 4 : ADD STYLE

Edit Layer

Data

Edit layer data and publishing

dewetra:LCA_Streams_WGS84

Configure the resource and publishing information for the current layer

Dimensions

Tile Caching

About & Status

Server Status

GeoServer Logs

- Contact Information
- About GeoServer
- Process status

Data

💹 Layer Preview

Workspaces

Layers

🧐 Styles

Services

100

Response Cache Headers Cache Time (seconds)

HTTP Settings Caching Settings

Root Layer in Capabilities:

Publishing

Security		
NMS Settings		
_ayer Settings		
✓ Queryable		
Opaque		
Default Style		
line 🔻		
Additional Styles		
Available Styles	⇒	Selected Styles
generic		ewetra:style_LCA_streams
line		Law and the second s
point		
polygon		
raster		

Default Pendering Ruffer



1. CREATING A NEW LAYER IN DJANGO

2. CONFIGURING NAME / GROUP / POSITION

3. PUBLISHING THE LAYER

Django administration

Site administration

Authentication and Authorization		Recent Actions
Groups	🖶 Add 🛛 🥒 Change	My Actions
Users	💠 Add 🛛 🤌 Change	LCA Topo Map downtrail CA topo work84 con
Dewetra2		(static) (static)
Events	🗛 Add 🛛 🥖 Change	Layer
Geo scales	🗣 Add 🛛 🥒 Change	dewetra:LCA_Streams_WGS84
Groups	🖶 Add 🛛 🥖 Change	(STATIC) (STATIC) Layer
Layer categorys	🖶 Add 🛛 🥖 Change	LCA Stream TEST1 dewetra: I CA Streams WCS84
Layer group permissions	🖶 Add 🛛 🥖 Change	(static) (static)
Laver types	🗣 Add 🛛 🥒 Change	DDS LCA VPN
Layers	🖶 Add 🛛 🥖 Change	Server
Paths	🖶 Add 🛛 🥖 Change	<pre>// LCA Stream TEST1 dewetra:LCA_Streams_WGS84</pre>
Servers	🖶 Add 🛛 🥖 Change	(static) (static)
Tags	🖶 Add 🛛 🥒 Change	DDS_LCA_VPN
User settingss	🖶 Add 🛛 🥖 Change	Server
Widget prop attrs	🖶 Add 🛛 🧷 Change	dewetra:LCA_Streams_WGS84
Widgets	🖨 Add 🛛 🥖 Change	(Static) (Static) Layer
		*
		Geo scale LCA Stream TEST1 dewetra:LCA_Streams_WGS84 (static) (static)

)jango administration	Welcome, admin. Change password / Log out	STEP 1: CREATING A NEW LAYER
ome > Dewetra2 > Layers		
Select layer to change	Add layer +	
Q Search	×	
Action: 🔽 🔽 🖌 Go 0 of 12 selected		
Layer		
LCA Topo Map dewetra:LCA_topo_wgs84_cog (static) (static)	N	
LCA Stream TEST1 dewetra:LCA_Streams_WGS84 (static) (static)	Diango administration	
Adm. Boundaries Level 0 geonode:admin_0_world2 (static) (static)	Django administration	
Adm. Boundaries Level 1 geonode:admin_1_world2 (static) (static)	Home > Dewetra2 > Layers > Add layer	
Catchments boundaries (Level5) geonode:hybas_lev05 (static) (static)	Add laver	
Catchments Boundaries (Lev. 0) CIMA:wribasin (static) (static)		
Catchments boundaries (Lev. 5) CIMA:hybas_lev05 (static) (static)	Dataid:	
Catchments boundaries (Lev. 4) CIMA:hybas_lev04_complete (static) (static)	Name	
Adm. Boundaries (Level 0) CIMA:ne_50m_admin_0_countries (static) (static)	Name.	
GFS 0.25° GFS025 (dynamic_v3) (forecast)	Descr	
Adm. boundaries (level 4) dew:gadm36 (static) (static)		
GSMaP GSMAP_ADRIARADNET (dynamic) (observation)		
12 hours		
12 layers		
		ji.
	Thumb:	
	Metadata:	
		h

Django administration

Home > Dewetra2 > Layers > Add layer

Add layer

Dataid:				
Name:	Dataid:			
Descr:	Name:			
Thumb:	Descr:			
Metadata:	Thumb:			1
	Metadata:			

ICON

<u>https://mydewetra.cimafoundation.org/portals/commons/dew</u> <u>etra_fontset/dewetra/ico_layer.html</u>

Dataid \rightarrow GEOSERVER NAME! Set the following: 1. Name 2. Descr 3. Bounding Box 4. Type \rightarrow Static 5. Server → DDS_LCA_VPN 6. Tags \rightarrow Position in myDEWETRA 7. Groups \rightarrow Who can see it 8. Path \rightarrow Folder mode in myDEWETRA 9. Category \rightarrow Static 10. Icon \rightarrow select from the website 11. Source 12. Geoscale Save and Check on Dewetra!

www.cimafoundation.org

STEP 2: CONFIGURING THE LAYER

VISUALISE THE DATA IN DEWETRA



Upload the LCA Hydromet station file to myDEWETRA, under the "BASIC" TAG

Save it as LCA_HydrometStations_[NAMESURNAME].shp, to avoid "conflict" with colleagues.

Bonus track 1: save it under another TAG, for instance "Hydrography" Bonus track 2: change the style, creating a new one with QGIS Bonus track 3: upload the file streamstm_EPSG2006.shp (not WGS84) Upload the LCA SLOPES file to myDEWETRA, under the "BASIC" TAG

Save it as LCA_SLOPES_WGS84_[NAMESURNAME].shp, to avoid "conflict" with colleagues.

Bonus track 1: change ICON of the product Bonus track 2: change the folder position of the product Existing WMS services might be connected by:

- Using on-the-fly publication
- Setting a new server in Django



Home > Dewetra2

Dewetra2 administration

Dewetra2	
Events	🖶 Add 🥏 Change
Geo scales	🖶 Add 🛛 🥒 Change
Groups	🖶 Add 🛛 🥜 Change
Layer categorys	🖶 Add 🛛 🥜 Change
Layer group permissions	🖶 Add 🥏 Change
Layer types	🖶 Add 🛛 🥒 Change
Layers	🖶 Add 🛛 🥒 Change
Paths	🗛 Add 🦪 Change
Servers	🗛 Add 🛛 🥒 Change
Tags	🖶 Add 🥏 Change
User settingss	🖶 Add 🛛 🧷 Change
Widget prop attrs	🖶 Add 🛛 🧷 Change
Widgets	🖶 Add 🛛 🥖 Change

Name: GLOFAS_WMS Descr: GLOFAS_WMS Url: http://globalfloodsows.ecmwf.int/glofas-ows/ows.py User: user Password: pwd

Django administration							
me > Dewetra2 > S	ervers > Add server						
dd server	i						
Name:							
Descr:							
Url:					<i>h</i>		
User:							
Password:							

EXERCISE 3: CONNECT EXTERNAL SOURCE