

QGIS Application - Bug report #8592

Field Calculator: Nonsense values for \$area and \$perimeter

2013-09-10 10:21 AM - Bernd Vogelgesang

Status:	Closed	
Priority:	Severe/Regression	
Assignee:		
Category:	Vectors	
Affected QGIS version:	2.0.1	Regression?: No
Operating System:		Easy fix?: No
Pull Request or Patch supplied:		Resolution:
Crashes QGIS or corrupts data:		Copied to github as #: 17334
Description Calculating an area field for a polygon layer in todays 2.1-dev from osegeo4w, the field is filled with strange 9-digit numbers, positive or negative ones, or zero. Done this with a polygon layer in DHDN-Gauss-Grüger 4, 1.8 correctly calculates the value e.g 334325 while in 2.1, the preview of the calculator shows the same value, but fills in 0. Other values: 187868 -> -139069743 92118 -> 109699764 Tried it both with integer and decimal fields. Just tested also \$perimeter: same strange numbers in comparison to 1.8		
Related issues: Related to QGIS Application - Bug report # 8738: Field Calculator with problems Closed 2013-10-01		

History

#1 - 2013-09-10 10:23 AM - Giovanni Manghi

can you please attach sample data? This issue surfaced recently or it was already there in previous master/dev releases pre-2.0?

#2 - 2013-09-10 10:23 AM - Giovanni Manghi

- Status changed from Open to Feedback
- Category set to Vectors

#3 - 2013-09-10 10:34 AM - Paolo Cavallini

- Subject changed from Field Calculator: Nonsense values for \$area and \$perimeter in 2.1-dev to Field Calculator: Nonsense values for \$area and \$perimeter in 2.1-dev

#4 - 2013-09-10 10:38 AM - Bernd Vogelgesang

- File PolygonsAreaPerimeter.zip added

Here my simple layer:

2nd field is \$area in 1.8

3rd field is \$area in 2.1

4th field is \$perimeter in 2.1

5th field is \$perimeter in 1.8

Don't know which version i used last time to calculate \$area. Just realized then that it doesn't handle multi-part object correctly.

#5 - 2013-09-10 11:32 AM - Giovanni Manghi

- File *fc_tests.tar.gz* added

I tested your vector with qgis 1.9 on linux a few days old, and with qgis 2.1 on Windows: I cannot confirm this issue, in both cases the results are identical to the ones computed by qgis 1.8 by you. See attached file.

#6 - 2013-09-11 07:28 AM - Bernd Vogelgesang

On my computer at home, this didn't happen as well. Today reinstalled QGIS from scratch, loaded the project and tried again. The same error occurred. When i open the file in a fresh project, it calculates correctly.

So i think there must have happened sth strange to the project file when getting converted from 1.9 to 2.1 ?

Anyway, have to redo the project then.

Update:

Now it didn't even work when loaded in a new project. Even deleted .prj and .qgj-files before loading and assigned GK4 for the file and the project. Still the same outcome.

Then deactivated on-the-fly transformation for the project: TADA! correct values.

So, it definitely doesn't work with on-the-fly transformation for this shape!

#7 - 2013-09-11 11:19 AM - Giovanni Manghi

| *So, it definitely doesn't work with on-the-fly transformation for this shape!*

ok confirmed.

So... in QGIS 1.8 works as expected even when reprojecting?

#8 - 2013-09-11 11:24 AM - Giovanni Manghi

- Priority changed from Normal to Severe/Regression

- Target version set to Future Release - High Priority

- Status changed from Feedback to Open

| *So... in QGIS 1.8 works as expected even when reprojecting?*

oh yes... so this is a BAD BAD regression...

#9 - 2013-09-11 02:43 PM - Bernd Vogelgesang

just to clarify: there was nothing to reproject. The layer and the project was in the same CRS. The difference was made activating or deactivating on-the-fly transformation for the project.

btw: same issue under Linux Mint with debian-nightly.

Update:

I just copied my features to a fresh shape file layer with EPSG 31468. Now the calculation go right, no matter if transformation was on or off!

I have no idea what can go wrong with a shape file. This one was created in an environment (presumably under 1.8 or 1.9, I often switch) with layers in EPSG 4326, 31468 and 3857.

But sth must have changed in QGIS behavior as well: When i load the layer in 1.8 in a fresh project, the project crs switches to 31468, while in 2.1 it stays in 4326.

Hope s.o. will figure it out.

#10 - 2013-09-12 01:36 PM - Giovanni Manghi

Bernd Vogelgesang wrote:

just to clarify: there was nothing to reproject. The layer and the project was in the same CRS. The difference was made activating or deactivating on-the-fly transformation for the project.

btw: same issue under Linux Mint with debian-nightly.

Update:

I just copied my features to a fresh shape file layer with EPSG 31468. Now the calculation go right, no matter if transformation was on or off!

I have no idea what can go wrong with a shape file. This one was created in an environment (presumably under 1.8 or 1.9, I often switch) with layers in EPSG 4326, 31468 and 3857.

But sth must have changed in QGIS behavior as well: When i load the layer in 1.8 in a fresh project, the project crs switches to 31468, while in 2.1 it stays in 4326.

Hope s.o. will figure it out.

I confirm the issue also with other projections that I'm more familiar with, like 3763.

#11 - 2013-09-28 01:01 PM - Bernd Vogelgesang

I have to report that this issue also occurs with 2.01 stable, so not only master is affected.

Today within a course, this happend on my Win7 machine with osgeo4w-setup and also on another Win7 with a standalone install, while the same fresh standalone install on a XP-Notebook didn't show this behaviour.

This time we processed OSM-Data, projected from WGS84 to DHDN Gauss-Krueger zone 4.

#12 - 2013-09-28 01:07 PM - Jürgen Fischer

- Subject changed from Field Calculator: Nonsense values for \$area and \$perimeter in 2.1-dev to Field Calculator: Nonsense values for \$area and \$perimeter

- Affected QGIS version changed from master to 2.0.1

#13 - 2013-09-29 05:19 AM - Giovanni Manghi

Bernd Vogelgesang wrote:

I have to report that this issue also occurs with 2.01 stable, so not only master is affected.

Today within a course, this happend on my Win7 machine with osgeo4w-setup and also on another Win7 with a standalone install, while the same fresh standalone install on a XP-Notebook didn't show this behaviour.
This time we processed OSM-Data, projected from WGS84 to DHDN Gauss-Krueger zone 4.

I confirm it seems fixed in qgis master. If no backports are expected then should not this be closed?

#14 - 2014-01-15 05:47 AM - Paolo Cavallini

- Status changed from Open to Closed

If this works in master, it can indeed be closed. Reopen if necessary.

#15 - 2014-01-15 05:59 AM - Giovanni Manghi

Paolo Cavallini wrote:

If this works in master, it can indeed be closed. Reopen if necessary.

it is not fixed, but anyway there is another ticket about it.

Files

PolygonsAreaPerimiter.zip	10.8 KB	2013-09-10	Bernd Vogelgesang
fc_tests.tar.gz	10.9 KB	2013-09-10	Giovanni Manghi