

# How can I form polygons from lines

Asked 16 years ago

Modified 16 years ago

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1



I have a bunch of 2-dimensional lines, whose start and end points are known. The lines might occasionally cross each other, or one line might end in the middle of another line. I need to form polygons from this mesh of lines. If necessary, I can ensure that the left side of all lines are inside their polygons.

algorithm

geometry

polygon

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asked Dec 17, 2008 at 18:07



[erikkallen](#)

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and here i was thinking that lines have only one dimension... something new every day :) – user3850 Dec 17, 2008 at 19:47

- 1 @hop: I think he meant he has a set of lines on a 2-dimensional plane as opposed to residing in 3-dimensional space. – [oz10](#) Dec 18, 2008 at 2:12

Perhaps the answer to my question will also help you: [stackoverflow.com/questions/13847933/...](http://stackoverflow.com/questions/13847933/...) – [Kyudos](#) Dec 16, 2012 at 22:32

# 1 Answer

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2



What you're describing is what we called "parcelization" or "spaghetti cutting", and then "polygonization" when I worked for GeoVision. Basically you want to cut the lines where-ever they intersect other lines and themselves, and then you want to assemble them into polygons by traversing line/node/line until you find a closed polygon.



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answered Dec 17, 2008 at 18:25

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**Paul Tomblin**

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