



Are mountains meandered like rivers?

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If we look at the satellite image from Hindu kush mountain to Zagros mountain we see several depression which are surrounded by loop-like mountainous meander. In first meander we see Helmand and Mashkal Basins in second meander Lut and Jaz Murian Basins in third meander Sirjan Basin and in fourth meander Mesopotamian Basin. Is there any similarity between river meandering and mountain meandering? We claim here that these two phenomena subjected to the same rules, only difference in scale. Fractures cause to meandering in rivers and flexure in mountains. These fractures spread polygonally in the earth, fracture pattern manifests a least-work configuration that minimizes perimeter, area and energy. This configuration developed as one of the five curves which named as “ Inflectional Euler Elastica” in mathematics. Indeed these curves envelope of interferenced rotated polygons i.e. Ω -like symbol in Central Iran Block (second meander) which are fitted numerically with third curve and third and fourth meander with second curve which named as “Rectangular Euler Elastica” .