

**GEOLOGI DAN STUDI STRUKTUR GEOLOGI
DAERAH TULUNGREJO DAN SEKITARNYA
KECAMATAN PANGGUNGREJO KABUPATEN BLITAR
PROVINSI JAWA TIMUR**

SARI

Oleh:

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Lokasi penelitian merupakan bagian Zona Pegunungan Selatan Jawa Timur, secara administratif terletak pada Daerah Tulungrejo, Kecamatan Panggungrejo, Kabupaten Blitar, Provinsi Jawa Timur. Secara geografi terletak pada koordinat $111^{\circ} 40' 41.71''$ BT- $112^{\circ} 10' 16.1''$ BT dan $7^{\circ} 58' 52.94''$ LS- $8^{\circ} 9' 5.64''$ LS. Luas daerah penelitian $9\text{ km} \times 7.5\text{ km}$ dengan skala 1:25000.

Metodologi yang dilakukan dalam penelitian ini terdiri dari empat tahapan, yaitu: tahap pendahuluan (pra-lapangan), tahap pelaksanaan (lapangan), tahap pasca-lapangan (pengolahan data), dan tahap penyusunan laporan.

Pola pengaliran daerah penelitian terdiri 2 jenis, yaitu: subdendritik dan subparagraph. Geomorfologi daerah penelitian terdiri dari 3 satuan bentukan asal dan 5 satuan bentuklahan, yaitu bentukan asal struktural terdiri dari perbukitan homoklin (S1), gawir garis sesar (S2), dan lembah struktural (S3), bentukan asal karst terdiri dari perbukitan karst (K1), dan bentukan asal fluvial terdiri dari tubuh sungai (F1). Stratigrafi daerah penelitian dari tua ke muda terdiri dari Satuan breksi vulkanik Mandalika (Oligosen Akhir-Miosen Awal), Satuan tuff Mandalika (Oligosen Akhir-Miosen Awal), Satuan Litodem Andesit (Miosen Awal), dan Satuan batugamping Wonosari (Miosen Tengah-Miosen Akhir). Struktur geologi yang berkembang pada daerah penelitian berupa sesar mendatar yang berarah baratdaya-timurlaut, utara-selatan, dan sesar normal yang berarah baratdaya-timurlaut dan barat-timur.

Hasil analisis struktur geologi daerah penelitian didapatkan 4 jenis sesar yaitu, *Normal Right Slip Fault*, *Normal Left Slip Fault*, *Right Normal Slip Fault*, dan *Left Normal Slip Fault*. Hasil analisis struktur geologi, tipe pola pengaliran dan juga analisis arah tegasan pola pengaliran maka dapat diketahui bahwa struktur geologi tidak terlalu mempengaruhi daerah penelitian.

Potensi geologi daerah penelitian terbagi menjadi 2 yaitu, potensi positif dan potensi negatif. Potensi positif terdiri dari bahan galian batugamping dan geowisata, sedangkan potensi negatif terdiri dari gerakan massa.

GEOLOGY AND GEOLOGY STRUCTURE STUDY
TULUNGREJO REGION AND AROUND
PANGGUNGREJO SUBDISTRICT BLITAR DISTRICT
EAST JAVA PROVINCE

ABSTRACT

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The research location is part of the Southern Mountains Zone East Java, in administrative research area is located at Panggungrejo Subdistrict, Blitar District, East Java Province. Geographically is located at UTM coordinate 111° 40' 41.71 "E-112° 10' 16.1" E and 7° 58' 52.94 "LS-8° 9' 5.64" LS. Research area covering 67,5 km² with length 9 km and width 7,5 km , with scale 1: 25.000.

The methodology used in this research consisted of four stages: the preliminary stage (pre-field), the implementation phase (field), post-field phase (data processing), and the stage of preparation of the report. Drainage pattern in the research area consist of four pattern included sub-dendritic (SD) and sub-parallel (SP). Descriptive analysis from any landscape morphology, research area consist of four origin forms that is fluvial, karst, and structural. It's divide into five land forms that is Homoclinal Hills (S1), Escarpment Fault Line (S2), and Structure Valley (S3), Karst Hills (K1), River (F1). Field observation result and laboratory analysis, research area can divide into unofficially five lithostratigraphic units with order from old to young are: composed of units of volcanic breccia Mandalika (Late Oligocene-Early Miocene), Unit tuff Mandalika (Late Oligocene-Early Miocene), Unit Litodem Andesite (Early Miocene), and Unit limestones Wonosari (Middle Miocene-Late Miocene). Geological structure that developed in the area of research in the form of a horizontal fault trending southwest-northeast, north-south, and normal faults trending southwest-northeast and west-east.

Results of the analysis of the geological structure of the research area 4 types of faults, namely, Normal Fault Slip Right, Left Normal Fault Slip, Slip Fault Normal Right, and Left Normal Fault Slip. Results of the analysis of geological structure, the type of drainage pattern and also the analysis of the direction of sharpness drainage patterns it can be seen that the geological structure is not unduly influence the research area.

Geological potential of the research area is divided into two, namely, the potential positive and negative potential. Positive potential is composed of limestone excavated materials and Geotourism, while the negative potential is composed of a mass movement.