

Field trip

[Science](#), [Physics](#)



Instruction: Task: Field Trip Report. Field trips enable us have a better understanding of any discipline that is under study. By actually going to an area and studying it, we are able to extend the knowledge from the classroom into the real world. Such practical experiences facilitate a correlation between theory and what actually exists out in an area.

Therefore, a detailed analysis of the various data collected during a visit to an outcrop can successfully highlight the importance of such trips. In essence, this report will focus on the geographical position of the area, an analysis of the general geological information in addition to any other notable geological characteristics.

The selected outcrop is within the Marietta topographic quadrangle. It is located along route 7 in Ohio, West Virginia. In terms of the co-ordinates, it is within Sec. 2, T2N, R9W. The outcrop exists within an elevation of 640, which is from its base. The Bedrock Geology of Washington County rates the outcrop as of Pennsylvanian age. The rock formation is of the Monongahela group. The general rock types that exist in this outcrop are shale, siltstone, red shale, and greywacke. Consequently, the following breakdown describes the various compositions that make up the basal layers:

Layer 1 is made up of 0.5m shale which is moss green. It also has plenty of fern fossils and has a covered basal contact. This layer lies at a lateral intersection with siltstone. Layer 2 consists of 1.5m siltstone. This is greenish grey in colour and exists as a composite. It is also covered in fern fossils and has a covered basal contact. It lies at a lateral intersection with red shale. Layer 3 consist of 3.0m of red shale that is largely reddish in colour. This also has covered basal contact and fern fossils. Layer 4 has 1.

7m of greywacke that is grey in colour. This layer tapers laterally and lacks the ferns. Its basal contact is irregular. Layer 5 is 2. 2m of grey siltstone made up of larger lateral grains. There are no ferns and the basal contact is uneven. Layer 6 has 3. 5m of greywacke with larger grains. Layer 7 is made up of 1. 5m of laterally layered greywacke. The final layer 8 is made up of 1. 5m of grey granulated siltstone.

From such a study, various inferences can be drawn from the results, and the corresponding analysis can be compared to pre-existing theory. This is important in understanding the landscape of such a region due to the dynamic nature it has. The hilltops are predominantly made of greywacke sandstones due to their resistance to weathering. The valleys are otherwise made up of sandstones and shale that erode very easily. As a follow up, a subsequent essay on the interpretations regarding the depositional surroundings of the sandstones and shale can sufficiently shed more light.