

Core sampling at Öskjuhlid locality for
petrophysical analysis Nov. 1st 2002

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Introduction

A large collection of samples were taken from a Pleistocene olivine tholeiite lava shield in Öskjuhlid in Reykjavik in 1997 (c.f. Fridleifsson et. al. 1997), and studied with respect to various petrophysical properties. This present sampling had the purpose to provide sample material for Julia Frolova, Moscow University, who intends to study the axial compression and porosity of the samples.

Sampling

The selection of sample locations were based on work by Valgardur Stefansson, who has showed that a relation exists between the calculated elastic module of the Öskjuhlid samples and their porosity. These samples formed three distinct groups with respect to these properties. The objective of the present sampling is to use cores taken at type localities to compare the axial compression and porosity with calculated values.

The samplesites were selected as close to earlier samples as possible. The exact sample-number of the earlier sample groups are not known precisely, aside the rough correlation presented in the following table:

Sampling 2002	Group I a-d	Group II a-c	Group III a-e
Sampling 1997	R107-116	R130-134	R85-106

The sample sites were photographed as shown in the following figures where the sample numbers are marked.

The following samples were sent to Julia Frolova: Group Ib,c, Group IIb,c, Group IIIc,d. The remainder of the samples are kept in the petrophysical core collection at Orkustofnun.

The names of these new samples will be changed in order to fit into the naming system of the main petrophysical rock collection. The names of the earlier Öskjuhlid samples ranged from R-30 to R-134. The new samples will be called as follows:

<u>Original name</u>	<u>Pet.-collection name</u>
Group Ia	R-135
Group Ib	R-136
Group Ic	R-137
<u>Group Id</u>	<u>R-138</u>
Group IIa	R-139
Group IIb	R-140
<u>Group IIc</u>	<u>R-141</u>
Group IIIa	R-142
Group IIIb	R-143
Group IIIc	R-144
Group IIId	R-145
<u>Group IIIe</u>	<u>R-146</u>

References.

Fridleifsson, G.O., Franzson, H., Gudlaugsson, S.Th., and Jonsson, S.S., 1997. Samples from Öskjuhlid for the TCP-project. NEA-report GÓF-HF-STG-SSJO – 97/06, 3p.





