

Illumina Genotyping DNA Guidelines.

Project Management.

• Once a project has been accepted a **project code** and a project coordinator will be assigned to it and all queries will be dealt with by that individual.

Sample Preparation.

- No specific kit or protocol is specifically recommended.
- A protocol or kit which provides high quality DNA and sufficient yield are the main criteria.
- If required Edinburgh Genomics will provide in house protocols.

DNA Quality.

- Edinburgh Genomics will assume DNA quality will have been checked before shipping.
- DNA should have a 260/280 ratio of greater than 1.6
- DNA should have a 260/230 ratio greater than 1.2
- Acceptable and unacceptable DNA qualities are shown on figure 1.
- Greater than 90% of the DNA should have a molecular size greater than 12kb



Figure 1 Example of Acceptable Quality DNA (lane 1) and Unacceptable Degraded DNA (lane 2). Run on 1% agarose gel.



DNA Quantification.

- DNA samples should ideally be quantified by PicoGreen assay. This assay has given consistent sequencing results.
- Quantification using other methods such as the Nanodrop and Spectrophotometers can be less accurate leading to variable genotyping results.

If your samples fail to achieve the DNA quality or quantity required by Edinburgh Genomics or you are unable to test your DNA please contact us before sending samples.

DNA Requirements and Shipping.

- Dilute DNA to 50 ng/ μ l in water or TE (10mMTris 1mM EDTA pH8.0).
- A minimum volume of 50 μ l of each sample should be sent.
- When the samples are ready the project co-ordinator will send one of the following:
 - Samples sent in individual tubes.
 - A Sample form. Fill in the requested details and return and electronic copy to Edinburgh Genomics. Also make a hard copy to return with your samples
 - Sterile screw top tubes for the samples.
 - A set of labels for the sample tubes. The sample form must be returned with your samples.
 - Boxed sample tubes in an addressed jiffy bag to be returned to Edinburgh Genomics by next day delivery at appropriate temperature.
 - \circ $\;$ Samples sent in 96 well plates.
 - A Sample form. Fill in the requested details and return and electronic copy to Edinburgh Genomics. Also make a hard copy to return with your samples
 - A 96 well plate for the samples sealed with a self-adhesive seal or heat seal.
 - A set of plate labels for the sample plates. The sample form must be returned with your samples.
 - Wrap plate in bubble wrap and send to Edinburgh Genomics in an addressed jiffy bag by next day delivery at appropriate temperature.
- Please contact us before shipping your samples so that we can send sample sheets and labels to you and discuss the format of tubes or plates for the samples.
 - Shipping Address
 - Edinburgh Genomics The Roslin Institute University of Edinburgh Easter Bush



Midlothian EH25 9RG UK

Telephone: +44(0) 131 651 9412

Return of Results.

• The exact format for results return will be discussed to meet individual requirements.