

## Protocol for additional NMR investigations

General	<p>The <math>^1\text{H}</math>-NMR spectroscopy of body fluids is a modern and very promising method for the diagnosis of known and unknown metabolic diseases in neonates. It can also give additional information to any screening method following different indications for the effective use of NMR measurement.</p> <p>Biochemical indications:</p> <ol style="list-style-type: none"> <li>1) In another technique, abnormal body fluids or an unknown metabolite was observed repeatedly. NMR spectroscopy can provide structural information on relevant metabolites.</li> <li>2) An independent confirmation of a diagnosis of a specific technique is required.</li> <li>3) For one or more metabolites found by using standard imaging techniques that do not result in a diagnosis of abnormal result, NMR spectroscopy can provide additional information.</li> </ol>
Analyses	Proton-containing compounds in body fluids
Description	Assay, Quantification and Interpretation
Method	$^1\text{H}$ -NMR Spectroscopy
Sample	Urine, heparinized blood plasma, cerebrospinal fluid (CSF)
Costs	270 € per sample. For this we will send an invoice with payment instructions.
Turn-around time	10 days
Shipment instructions	Please download all documents from: <a href="http://www.infai.de">www.infai.de</a> → NMR → Metabo Test INFAI
Delivery Address	INFAI GmbH, Gottfried-Hagen-Str. 60-62, 51105 Köln, Germany
Contact	<p>INFAI GmbH, Gottfried-Hagen-Str. 60-62, 51105 Köln, Germany</p> <p>Phone: +49-221-88044-3</p> <p>E-mail: <a href="mailto:mail@infai.de">mail@infai.de</a></p>
References	<ul style="list-style-type: none"> <li>• S. Aygen et al. "NMR-Based Screening for Inborn Errors of Metabolism: Initial Results from a Study on Turkish Neonates" (<a href="#">Publication</a>)</li> <li>• Metabo Test INFAI – "NMR based screening for inborn errors of metabolism" (<a href="#">Brochure</a>)</li> <li>• M. Spraul, S. Aygen – Urine Based Newborn Screening Project applying High Resolution NMR-Spectroscopy (<a href="#">Flyer</a>)</li> </ul>