

<b>Name of the course</b>	<b>Chemical analysis in quality system</b>
Number of instruction hours	20
Outline of course/module content	<p>Systematic approach to chemical analysis. Analytical system. Analytical signal – analytical result – analytical information. Information theory in analytical chemistry.</p> <p>Elements of quality system. Quality assurance of measurement process. Importance of suitable measurement process in quality assurance of processes and product. Planning and standardization of measurement process. Planning and optimization of experiments. Sources of errors and their elimination. Impact of measurement uncertainty on result and decision.</p> <p>Quality control. Validation. Measurement uncertainty. Traceability. Internal and external quality assessment. Interlaboratory studies. Referential materials. Control charts. Independent assessment of quality system. Quality improvement.</p>
Description of instruction methods	Lectures, consultations and seminar papers
Description of course/module requirements	Oral presentation of the seminar paper, oral exam