

3 credits

0 h + 105.0 h

Q2

Teacher(s)	Herent Marie-France ;Muccioli Giulio coordinator ;
Language :	French
Place of the course	Bruxelles Woluwe
Prerequisites	general chemistry ; organic chemistry ; introduction to analytical chemistry <i>The prerequisite(s) for this Teaching Unit (Unité d'enseignement – UE) for the programmes/courses that offer this Teaching Unit are specified at the end of this sheet.</i>
Main themes	The teacher(s), helped by graduate students and technicians, will discuss the different types of particle exchange in a solution. The aim is first to give the practical basis that will help to understand the theoretical notions studied during WFARM1243 ; second to form the students to the analytical reasoning.
Aims	<p>At the end of the activity the student will be able to</p> <p>1</p> <ul style="list-style-type: none"> • Behave in an analytical lab environment • To understand notions such as 'trueness, accuracy, experimental error' • To understand and use an experimental protocol • To discuss the results he has obtained during the experiment <p>-----</p> <p><i>The contribution of this Teaching Unit to the development and command of the skills and learning outcomes of the programme(s) can be accessed at the end of this sheet, in the section entitled "Programmes/courses offering this Teaching Unit".</i></p>
Evaluation methods	continuous evaluation based on the post-experiment reports, on the evaluation of the student preparation to the day's experiment, and a final exam.
Teaching methods	the activity takes place in didactic labs the actual experiments are preceded by theoretical exercises (that need to be prepared by the student)
Content	<ul style="list-style-type: none"> • General aspects of an analytical lab ('good laboratory practices') • Gravimetry and precipitometry <ul style="list-style-type: none"> • Quantification of sulfates and chlorides by several techniques, and quantification of iodide based on the European pharmacopoeia • Acidimetry <ul style="list-style-type: none"> • Titrations in aqueous media • Titrations in non aqueous media • Complexometry <ul style="list-style-type: none"> • Measure of the drinking water hardness • Screening for toxics (Bi ' Pb) • Oxydimetry <ul style="list-style-type: none"> • Quantification of several ions (iron, iodides, calcium) and of pharmaceutical substances (chloramine T, sulfanilamide)
Faculty or entity in charge	FARM

Programmes containing this learning unit (UE)				
Program title	Acronym	Credits	Prerequisite	Aims
Bachelor in Pharmacy	FARM1BA	3	WMD1105 AND WMD1106 AND WFARM1003	