



LUND
UNIVERSITY

Bachelor's Programme in Biomedicine

PROGRAMME QUALITY CLOSURE AND QUALITY PLAN 2023

Summary of programme quality closure

Results – focus on strengths and weaknesses

1. TBL has now been implemented in all courses at the programme and was overall appreciated. Concerns included short time between iRAT and re-iRAT in some courses, varying difficulty of iRATs and quality of TBL applications.
2. Ortrac was used in all courses for submission and assessment of assignments, as well as for communicating course material and information. Recurrent problem that material for preparation was sometimes not published well in advance to the learning activity. Teachers commented on slow technical support when problems occurred.
3. Course portfolios complement written examinations and are often graded (U/G/VG). The assignments are often seen as stressful by the students. In addition, instructions and assessment criteria are not always clear and students ask for more and earlier feedback.
4. Practicals were overall very appreciated, but also perceived as challenging by the students.
5. A recurrent comment from the course evaluations closures was a high workload, especially at the end of courses.
6. Response rates at course evaluations varied between 33% to 78%, with mean and median 56%.

Possible explanations

1. TBL is still new to some teachers and designing good iRATs, TBL applications and study guides is challenging.
2. Although improvements in Ortrac and more experience with the system, students and teachers are still not used to the system which causes technical problems and frustration.
3. Assessment criteria need to be specific for each assignment, aligned with course learning outcomes and clearly specify what is required for each grade. Feedback and evaluation of written assignments is very time-consuming and stressful for teachers.
4. The number and extent of practicals are limited by budget and logistics. Therefore, students may not be trained enough to feel confident in a laboratory setting.
5. Parallel learning activities (eg TBL and portfolio) can lead to a high and uneven workload.
6. Course evaluations are sent out after the course ends and are optional.

Suggestions of measures and further development

1. A TBL workshop with Larry Michaelsen was held for teachers in September 2023, with the following topics: Getting beyond covering content: a key to preparing students for future professions, Designing group work that really works, and Improving your TBL applications. This will be followed-up in teacher meetings during 2023/2024. All re-iRATs will be given as a common re-examination in each course.
2. A template for course start pages has been implemented and work is ongoing to structure courses with modules, in order to facilitate management by teachers and location of information, assignments etc for students.
3. The examination committee is, and will be, involved in the review of existing and construction of new assessment criteria. Teachers must have time for constructive feedback and evaluation of assignments, this will be prioritized in course budgets.
4. The existing practicals at the first semester will be reviewed, as they form the base for laboratory skills.
5. Teachers should review schedules to avoid crammed deadlines and communicate to students early what is expected in each activity.
6. Course managers are asked to inform students on changes done based on previous course evaluations, this could increase student's incitement to answer course evaluations.

The programme in figures

Number of students that applied to the programme 2022:	848+965	(national + international)
Number of students that applied to the programme 2022 with prio 1:	141+434	
Number of students that applied to the programme 2023:	833+1086	
Number of students that applied to the programme 2023 with prio 1:	155+479	
Number of new programme students accepted 2022:	27+26	
Number of new programme students accepted 2023:	22+35	
Number of new programme students that were registered 2022:	29+10	
Number of new programme students that were registered 2023:	21+19	
Funding agreement targets 2022 (MKr)	21.3*	
Result accounted for 2022 – (HST+HPR)	24.7*	
Number of full-time equivalent students 2022 (HST):	113	
Number of annual performance equivalent 2022 (HPR):	114	
Number of degrees awarded 2022:	27	
Budget for 2022:	18.4*	
Economic result 2022:	-0.5*	
Budget for 2023:	20.3*	
Number of teachers involved (>2h):		

**Both Bachelor and Master programmes.*

Representatives in committees

Programme director: Maria Swanberg

Programme steering committee:

Karin Stenkula, Mattias Collin, Thomas Hellmark, Viktoria Willenfelt Lumpkins, Sara Holmgren, Susanne Destow, Alexandra Velkova (student)

International committee:

Mattias Collin, Maria Swanberg

Examination committee:

Harry Björkbacka, Magnus Hillman (2022), Oonagh Shannon (until October 2022), Marianne Jansson (from spring 2023), João Duarte (from spring 2023), Josefin Malmberg (student), Alexandra Velkova (student)

Student welfare committee:

Bodil Sjögren, Nicholas Leigh (from October 2022), Susanne Destow, Sara Holmgren, Oonagh Shannon (until October 2022)

Other working groups or committees:

Appendixes

1. List of courses
2. Quality plan 2023



**FACULTY OF
MEDICINE**

Programme Quality Closure 2022/2023

Bachelor's Programme in Biomedicine

3. Course quality evaluations

Appendix 1. List of courses

Course code	Course name	Credits (ECTS)	Semester*	# of students	# passed the course	Course closure available
BIMB10	Biology and Chemistry of the Cell	30	Sem 1	38	35	yes
BIMB20	Biochemistry and Cellular Metabolism	7,5	Sem 2	38	37	yes
BIMB21	Genetics and Genomics	7,5	Sem 2	38	37	yes
BIMB23	The Cell and its Environment	15	Sem 2	38	35	yes
BIMB30	Developmental and Stem Cell Biology	7,5	Sem 3	41	41	yes
BIMB31	From Neuron to Nervous System	7,5	Sem 3	42	42	yes
BIMB32	The Immune System	7,5	Sem 3	43	41	yes
BIMB33	Host-pathogen Interactions	7,5	Sem 3	44	43	yes
BIMB40	Organ Systems and Homeostasis of the Human Body	15	Sem 4	44	39	yes
BIMB41	Molecular Basis of Disease	7,5	Sem 4	43	41	yes
BIMB42	Pharmacology and Drug Discovery	7,5	Sem 4	43	39	yes
BIMB50	Frontiers in Translational and Molecular Medicine	22,5	Sem 5	27	27	yes
BIMB51	Applied Biomedicine	7,5	Sem 5	27	26	yes
BIMK60	Degree Project	30	Sem 6	31	30	yes
VMFB23?	Methodology Project, First Cycle	15	FS	4	4	no
VMFB19?	Methodology Project, First Cycle	30	FS	3	3	no
			Sem 1			no
			Sem 1			no

* FS: Free standing

Valid for the academic year 23/24

Overall quality criteria	Quality objectives	Activities	Planned to start	Planned to end	Responsible	Status / Follow up	Actions/feedback:
<i>Refers to "Policy för kvalitetssäkring och kvalitetsutveckling av utbildning vid Lunds universitet"</i>		<i>Planned activities to reach the objectives</i>				<i>Annually</i>	<i>What does the program do with the results and how are these disseminated to relevant stakeholders?</i>
The actual study results correspond to learning and programme syllabus outcomes.	To have a complete mapping and blue printing of the programme to obtain alignment and transparency	1) Curriculum mapping: connect competences and learning outcomes to the programme syllabus in Ortrac (QPS) 2) Blueprinting: connect learning activities, assignments and assessments to course learning outcomes 3) Engagement of the PNM examination committee in course development.	Ongoing	1) Curriculum mapping was completed in 2022, and will be continuously updated for new learning activities, outcomes and courses. 2) Blueprinting is to be done whenever a new course syllabus, learning activity or assessment criteria are implemented. 3) Review of existing courses planned to be completed 2025. New courses/activities consequently.	Course managers, examiners and programme directors	Followed-up in conjunction with course quality closures and programme quality closure and with data from Ortrac. .	1) Teachers and programme directors can monitor mapping and blueprinting across courses within the program. When alignment needs improvement, this is discussed with representatives from the involved courses. 2) Students can individually follow their learning and results through the blueprinting in Ortrac. 3) Feedback from the examination committee on eg assessment criteria is formative for teachers and will improve current and future material.
The programme has the students' learning in focus.	To have student-centered learning throughout the programme in order to promote life-long learning and student responsibility for their own development.	Implementation and development of Team Based Learning (TBL) in collaboration with the TBLC. Flipped classroom strategies. Classroom activities focuses on	Ongoing	Ongoing	Course managers, programme directors and student representatives	In course evaluations, quality closures and by analyses of data in Ortrac.	Emphasize and prioritize student-centered learning activities in budgets and schedules as well as in workshops for teachers and course managers. Communication with student representatives.

		<i>interaction between students. Continuous assessment in QPS to visualize students' development. The mapping of activities and assessments to programme syllabus outcomes allows for analyses of performance at both an individual level and for cohorts.</i>					
The education is based on scientific basis and best practice.	<i>To use evidence-based learning methods to create the best possible conditions for learning.</i>	<i>- Education of teachers at MedCUL - Increase engagement of ETPs from the faculty's pedagogic academy. - Invite teachers that have done pedagogic projects within the programme to share the results with the programme management and other relevant course managers/teachers.</i>	<i>Ongoing</i>	<i>Ongoing</i>	<i>Programme directors.</i>	<i>In course course- and programme quality closures.</i>	<i>- Map and support teachers' pedagogic development. - Communicate with other Swedish programmes in Biomedicine through national meetings, and with international partner universities (eg U21). - Teachers and programme management to keep up-to-date on evidence-based teaching methods and course design, eg through workshops and feedback from the examination committee and ETPs.</i>
Teaching staff have suitable education in subject-specific, pedagogic and didactic competences	<i>To have teachers at the programme that have a keen interest in teaching, relevant pedagogic training and proven subject</i>	<i>- Education of teachers at MedCUL - Follow-up on course coordinators' and examiners' pedagogic development.</i>	<i>Ongoing</i>	<i>Ongoing</i>	<i>Programme directors, course managers and teachers.</i>	<i>Course quality closures.</i>	<i>- Discuss with respective teacher and make a development plan if improvement is needed. - Provide collegial support within the programme.</i>

	<i>expertise.</i>	<i>- Appointments as course managers and examiners are announced in open competition and evaluated in a structured way, with emphasis on pedagogic education, experience with active learning methods and subject expertise.</i>					<i>- Discuss teacher competencies and development with vice heads of departments (GAP).</i>
Teacher capacity is sufficient.	<i>To have a good recruitment base of teachers, course managers, examiners and programme directors with appropriate experience, education and long-term employment contracts to cover the programme's needs.</i>	<i>- To emphasize the programme's needs of teachers employed in the teacher category (senior lecturers, professors) to the Faculty management and respective board (Tjänste-AU). - To give appropriate compensation for teaching- and management assignments within the programme to be competitive compared to other assignments.</i>	<i>Ongoing</i>	<i>Ongoing</i>	<i>Programme directors, chairman of the board of master education (PNM), vice heads of departments (GAP), vice dean at the Faculty of Medicine</i>	<i>Quality dialogue and the faculty's employment dialogue (Tjänstedialog).</i>	<i>- Promote and highlight the need for senior lecturer-/ professorships in under-represented areas and highlight the consequences of lack of faculty-financed teacher positions on the overall teaching and programme quality and continuity.</i>
The education is relevant for the students based on the societal needs.	<i>To offer students relevant and authentic training in skills and applications that are required for their future profession.</i>	<i>-Authentic cases and examples from both life science industry and academic environments are implemented in applications and portfolio assessments.</i>	<i>Ongoing</i>	<i>Ongoing</i>	<i>Programme directors</i>	<i>- In course and programme quality closures. - Follow-up on alumni careers.</i>	<i>- Communication with national and international stakeholders, including universities, authorities and general public. - Interaction with life science industry through student internships, at national fora</i>

		<ul style="list-style-type: none"> - Representatives from areas outside academia are included in the teaching. - Interaction with partners such as Venture Labs to increase students' interest and knowledge in entrepreneurship. 					and at the local, student-organized career fair.
The students have influence over planning, execution and follow up of the education.	To have a good dialogue with, and involvement of, students to engage them in their current and future education. To improve the programme from a student perspective.	<ul style="list-style-type: none"> - Student representatives elected through BUR/MF are involved in relevant environments, such as board committees, working groups, programme workshops, the programme management group meetings and course evaluations. - Meetings are held in English when needed. 	Ongoing	Ongoing	Programme directors, course managers, student course representatives and the student educational association (BUR/MF).	<ul style="list-style-type: none"> - Followed-up at bi-weekly programme management meetings and bi-annually programme workshops. - In course evaluations and quality closures. 	Bidirectional communication between students and programme management to ensure understanding and needs from both students and teachers.
The learning and study environment are suitable and accessible for all students including well functional support activities.	To offer learning activities and environments that support participation and learning for all students at the programme.	<ul style="list-style-type: none"> - Information and workshops held by the academic support center, student welfare committee and study counselor. - Individual study plans when applicable. - Student surveys to map what works 	Ongoing	Ongoing	Programme director, student welfare committee and study counselor.	Continuously.	<ul style="list-style-type: none"> - Follow-up through the study counselor, student welfare committee and programme directors. - The outcome from surveys is communicated with teachers and course managers.

		<i>well and what needs improvement regarding learning activities and environments.</i>					
There is a continuous follow up and development of the programme	<i>To offer a competitive programme of highest international standards.</i>	<i>Programme development and quality work.</i>	<i>Ongoing</i>	<i>Ongoing</i>	<i>Programme management, student educational organisation (BUR/MF) and teachers.</i>	<i>Programme closure and quality assessment.</i>	<ul style="list-style-type: none"> - Communication with student organizations and other Biomedicine programmes at a national level. - Information to prospective students (fairs, online etc).
Internationalization and international perspectives are promoted in the programme	<i>Internationalization of the program is reflected in the student cohort, engagement of international teachers and a global perspective of Biomedicine.</i>	<ul style="list-style-type: none"> - International admission of students. - Student and teacher mobility. - Applications are designed with a global health perspective. - International engagement can be highlighted by a certificate of international merits (CIM) attached to the diploma. - Global perspectives are emphasized in information to prospective students. - As suggested by the quality evaluation 2020, internationalisation is mapped in Ortrac under Core-values. 	<i>Ongoing</i>	<i>Ongoing</i>	<i>Programme directors, international committee and international coordinator.</i>	<ul style="list-style-type: none"> - Balance in student exchange with partner universities followed-up annually. 	<ul style="list-style-type: none"> - Highlight the different perspectives and experiences that international students and teachers contribute with. - Open CIM seminars to promote student exchange and international engagement.

		<i>- SDGs are reflected in course syllabi and mapped in Ortrac.</i>					
Gender equality and equal treatment are integrated in the programme	<i>All students and teachers are treated equally and with respect.</i>	<i>- Through training and assessing group communication from start of the programme. - Zero tolerance for harassment or other unequal treatment. - Emphasize a professional behavior in course syllabi and highlight the importance of equality and diversity in teams and in learning activities. These should be mapped in QPS in order to follow progression.</i>	<i>Ongoing</i>	<i>Ongoing</i>	<i>Programme directors, course managers, teachers, study counselor, students.</i>	<i>- Course evaluations, questionnaires (eg Studentbarometern), psychosocial safety inspection.</i>	<i>Student meetings and teacher meetings.</i>
Relevant perspectives in sustainable development is promoted	<i>The programme contributes to sustainable development of academia, working life, education, health and environment.</i>	<i>- The sustainability goals are considered in the educational and course curricula and tagged in QPS. - Programme representatives took part in the U21 meeting August 2023 with the focus Climate and Global Health. - Plans for learning activity on Global Challenges,</i>	<i>Ongoing</i>	<i>Ongoing</i>	<i>Programme directors and course managers.</i>	<i>Course quality closures and Ortrac (QPS) tags.</i>	<i>- Workshop discussions with teachers and students. - Collaboration with University och Birmingham for Global Challenges course/module.</i>

Adequate administrative support for students, teachers, course managers and programme management.	<i>The administrative support facilitates students' learning, and allows teachers to focus on education rather than administration.</i>	<i>Discussion with administrative management to convey the programme's needs in terms of services and continuity.</i>	<i>Ongoing</i>	<i>Ongoing</i>	<i>Programme directors and programme administrators.</i>	<i>Regularly at programme management meetings and in dialogue with students and teachers.</i>	<i>Discussed at the programme board (PNM) and in quality dialogue.</i>