

2023 06 27

# Analysis of Program Evaluation 2023

Common questions and questions about the horizontal perspectives

#### Summary

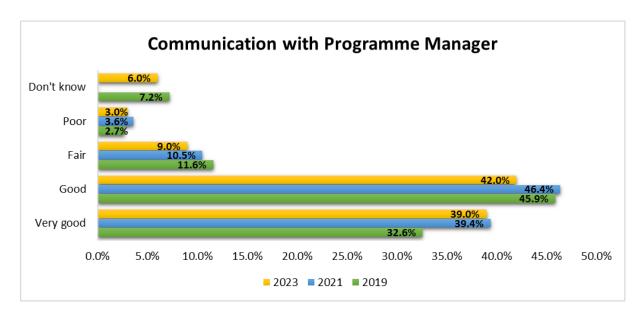
This report evaluates students' responses from programme evaluation survey for 2023. The survey emphasises on the overall experience of students regarding the facilities at the campus, communication with their teachers, balance between practical and theoretical aspects of courses, inclusivity in the learning environment. A total of 777 students (out of 2448) responded to the survey with a response rate of 31.74%. There were 414 respondents for question 5 & 6. The text response received from students are analysed and categorised into strengths and areas of improvement.

The results of survey indicate that students were satisfied with their learning experience at BTH. The quality of communication with the programme managers and teachers varied by courses. The figures for physical learning environment were indicative of the fact that students are recognizing the impact of functional and supportive environment on their studies. There was a positive perception about distance learning among students. The survey results stressed that supplementing recorded lectures with discussions and interactive sessions is inevitable in enhancing the distance-learning experience. Students perceived the courses in the programme to be well-balanced with clear and logical progression. In a nutshell, BTH was perceived to be welcoming, inclusive and providing a supportive learning environment.

The analysis is made by Anupama Unnikrishnan.

### 1. How has information from, and communication between you and the programme coordinator for your programme worked?

When evaluating the communication between the students and the programme manager, it can be seen from the figure below that 42% of the 777 respondents surveyed, rated the communication to be "good" and 39.4% students thought it was "very good". Compared to the previous years, majority of the students considered the communication with their programme manager to be either "very good" or "good". The figures from 2019 (32.6%) and 2023 (39%) for "very good" are indicative of the fact that the quality of communication between these two years have improved. The percentage of students rating the communication as "fair" or "poor" remained relatively low across three years, with a slight decrease over time.



The text responses received from students are categorised into strengths and areas of improvement. A summary is given below.

#### 1.1 Strengths

The text responses from students identified the ease of communication/availability and timely support from their programme managers in favour of communication. These areas are similar to those identified during 2019 and 2021 survey.

**Proactive:** Some students thought their programme manager was proactive in providing information and addressed student concerns. There was quick response when reaching the programme manager by phone/text. Students appreciated frequent updates, clear instructions and all the information shared via Canvas. Some students thought their program manager was enthusiastic, receptive, respectful and took initiatives.

**Support:** In addition to being proactive, students mentioned that the program managers also provided clear and concise explanations to their queries. The programme manager's responses had a positive attitude and encouraged students. Students appreciated the supportive, approachable, and easy to talk nature of programme managers.

### 1.2 Areas of Improvement

**Inconsistent communication:** Students who were less favourable towards good communication, reported that there was lack of response to emails, slow response times, troubles in getting answers. Some students expressed disappointment for the programme manager being uncontactable. There

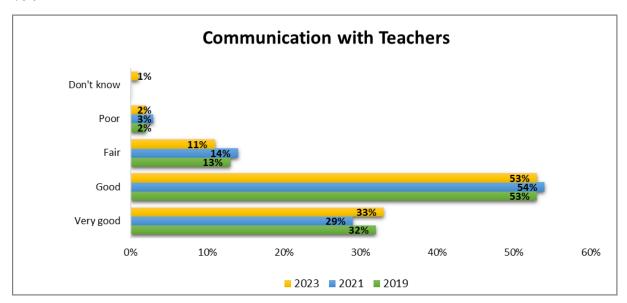
was also lack of timely communication about course schedule, assignments, and other program related issues. Some students also stated that they have not reached out to their program manager.

**Lack of support:** Limited or minimal communication was also related to lack of adequate support and conflicting information. There was also a mention about the lack of support regarding elective courses, degree projects, exchange studies.

2. How has the communication between you and your teacher worked during your period of study (for example information, feedback on your work, responses and answers to questions about your studies)?

The communication with teachers over the years, as illustrated in the figure below, fluctuated between 29% to 33%. The figures for 2023 indicate that more than 50% of the 777 respondents, rated their communication with the teaches as good. The students who thought the communication with their teachers was "very good", surpassed the 2019 figure, stood at 33%.

The text responses received highlighted that the quality of communication varies from teachers and courses. The strengths and areas of improvement identified from the text responses are summarized below:



#### 2.1 Strengths

**Timely feedback:** Students who had positive experience with communication with their teachers expressed that their teachers were prompt, helpful and provided constructive feedback. Some students have noted that the timely feedback on assignment have helped them to improve their work. Students identified canvas, email, and online discussions to be an effective source of communication with their teachers.

**Approachable & supportive:** Many students appreciated their teachers for being supportive, open to discussions, willing to address questions, providing helpful guidance. Some students also stated that teachers are committed, and adapt to student's level of understanding,

#### 2.2 Areas of Improvement

The text responses reveal that there is still room for improvement when it comes to communication with teacher.

**Clarity in Communication:** Some students stated that it required multiple emails to receive response from teachers. Furthermore, there was a conflict in the information provided by different teachers leading to confusions among students. There was also lack of clarity, inconsistent information and inadequate explanation about assignments or exams from the teachers in some courses.

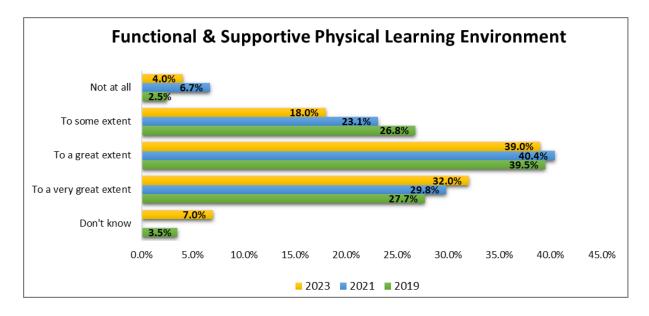
**Constructive Feedback:** The text responses highlighted the need for more timely and constructive feedback on assignment and exam. Students also stated that sometimes feedback came after the course ended which was not useful. Constructive feedback when the course is ongoing was appreciated by students which also facilitates their learning. Students also expressed their concern about the quality of feedback and assignments. They mentioned that feedback on some courses lacks depth, and the assignments are also poorly designed which did not assess students skills and knowledge.

### Comparison with previous years (2019 & 2021)

The issues raised in the previous year's surveys were also similar to 2023 survey. The quality of communication was perceived to vary between courses and teachers. Untimely feedback, lack of clarity in communication, inconsistent information, unconstructive feedback, inadequate explanation was some of issues which have been raised frequently in the previous years as well.

3. To what extent do you consider that the physical learning environment (for example, classrooms, library, laboratories, group rooms, and study sports) is functional and supportive to your studies?

The figure below depicts the perceived impact of physical learning environment on studies. The figures show a gradual increase, from 27.7% in 2019 to 32% (of the 777 respondents) in 2023, in the percentage of students who felt that the physical environment was functional and supportive "to very a great extent". This is indicative of the fact that students are recognizing the impact of functional and supportive physical learning environment on their studies.



### 3.1 Strengths

**Facilities and Resources:** Many students were happy with the resources available at the university. Well-equipped lecture halls, sound and functional computer labs, good library resources, support for distance education and online learning were identified as some of the factors contributing to a healthy study environment.

**Availability of study spaces:** The group and individual study spaces, spaces for socialising, pleasant physical environment were also identified by students in supporting their studies.

### 3.2 Areas of improvement

**Condition of study rooms:** Students identified lack of ergonomic seating, worn-out wooden furnitures in some study halls, limited spaces in study halls leading to overcrowding, poor ventilation and air quality in rooms, noisy library environment, poor acoustics in the "multisalen" leading to poor audio quality during lectures, limited access to program-specific labs were identified as some of the hindrances in their learning environment.

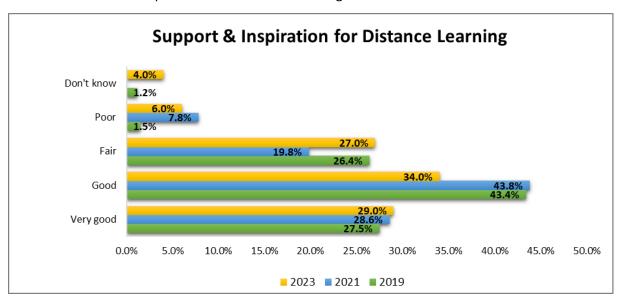
**Lack of Support:** Many students highlighted the lack of support and inadequate information for international students, for example, limited information regarding scholarships, access to library and study halls.

4. How well has the online distance-learning (forums, chat, recorded/live-stream seminars, online question time) supported and inspired you in your learning?

Student's perception about distance-learning is depicted in the figure below. In 2019, 27.5% perceived the distance-learning to be "very good", it increased in 2021 to 28.6% and 2023 survey again witnessed a slight increase to 29% (out of the 777 respondents)

When comparing these figures, it is crucial to consider that the years, 2021 and 2023 include both traditional distance courses and pandemic induced distance courses, while 2019 survey only includes the traditional distance courses.

The text responses from students who identified themselves as distance-students put forth several issues related to their experience with distance-learning.



### 4.1 Strengths

**Flexibility:** Recorded lectures provided during distance-learning were greatly appreciated by students. Students thought it was possible to rewind, pause and rewatch the recording at their own pace and convenience. This ensured retention of content and better understanding. Some courses still provide recorded lectures even though it is an on-campus course, this was valued by students as they could catch-up if they missed the live session. Students appreciated the use of quizzes and identified discord servers as a good platform for raising questions and communication with teachers and peers.

**Opportunities:** Some students considered distance learning as a platform for online group work and collaboration with tools like Zoom and other discussion forums.

### 4.2 Areas of Improvement

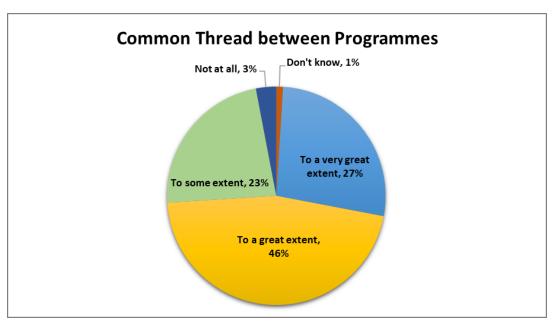
Lack of interaction: Even though recorded lectures were appreciated, it was also a cited as a concern for some students when it comes to face-face interaction with peers. The recorded lectures posed as a challenge for having engaging discussions, collaborative problem-solving sessions, and interactive element of live sessions. Moreover, with the recorded lectures, it was also not possible to have immediate clarifications if the topics were complex, potentially lowering motivation and interest in learning.

**Technical glitches:** Students identified poor audio and video quality, technical difficulties in accessing the recording as a hindrance to learning. There were also some challenges related to camera focus and screen sharing in hybrid rooms. Inconsistency in the use of online resources and lack of common thread in communication channels also led to confusion among students. Students also suggested to provide audio explanations accompanied by slides.

In view of the text responses, it is evident that supplementing recorded lectures with discussions and interactive sessions is inevitable in enhancing the distance-learning experience.

5. To what extent do you consider that the courses in the program are connected-that there is a common theme for the programme? (Students from semester 4 and above, as well as Master's students)

Out of the 414 respondents, 46% thought that the courses in the program are connected "to a great extent".



The text responses revealed that there was a mixed response from students regarding the common thread among courses in the programme and it varied across disciplines. Some students suggested that the courses build upon each other and had a clear progression, but some others felt that the courses were repetitive and disconnected.

### 5.1 Strengths

Clear progression: The text responses indicated that some courses had a common thread, and they build upon each other, leading to a logical progression with increasing complexity and in-depth knowledge. Some programmes started with basic knowledge providing a solid foundation and progressed into advanced topics facilitating experience in a specific area of expertise. Students also stated that some programmes tied together the knowledge from bachelor's level and provided broad set of skills preparing them to be professionals.

**Electives:** Students indicated that having electives helps in personalising their learning experience. The electives provide breadth beyond the specialization letting students to explore other areas as well. It provides them with a wide range of courses helping them to diversify their knowledge. The students also stated that some of the programmes are well rounded providing a great toolkit and preparing students for their master's thesis.

### 5.2 Areas of Improvement

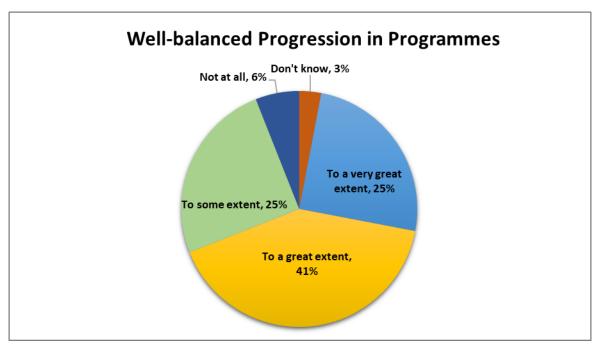
**Repetitive:** Some of the programmes were reported to have similar topics covered multiple times. Students suggested that this could be avoided if there is more collaboration and communication among teachers of different courses. Updated and refreshed course materials could also help in avoiding repetitive content.

Alignment of courses: Some programmes were reported to be deviating from the subject areas and were not aligned to students' interest or career goals. Students stated that the structure of the programme did not align with specialization, leading to mismatch. The order in which courses were offered could be improved to support better understanding and application of knowledge. Students also wanted some more information on how the courses are interconnected. It was emphasized that courses should be focussed on career prospects. It was also observed that the lack of connection created gaps in understanding among students.

**Imbalance between practical and theory:** Some courses lacked practical knowledge and only focused on theory. There were suggestions to include more industry related content, hands-on experience, and internship opportunities.

6. To what extent do you consider that there has been a well-balanced progression in the programme-that there has been an increase in complexity during the programme? (Students from semester 4 and above, as well as Master's students)

When evaluating the well-balanced progression in programmes, 41% of the 414 respondents thought there was progression among the courses "to a great extent" whereas 6% of the respondents reported an unbalanced progression in the programmes.



The text responses revealed that most of the students thought that the programmes had a mix of easy and difficult courses allowing the students to progress at their own pace. Students also noted that there was clear progression and that the programme gradually increased the level of complexity.

#### 6.1 Strengths

**Overlapping courses:** When it comes to progression and increase in complexity, students reported that it was good to have some overlapping concepts as it reinforced learning among the students. Some students also thought there was balance between practical and theoretical aspects of their courses.

**Project Courses and Specialization:** Many students found project courses to be rewarding, since with these courses the students could think critically, explore more and challenges themselves in several aspects. These courses also helped develop their practical skills and knowledge.

### 6.2 Areas of Improvement

**Lack of support:** Students reported that they do not get adequate support and guidance regarding assignments using a specific technology or software. Students expect clarity in the instructions and more assistance for the assignments. Some students reported to have inconsistency in teaching quality and support from their teachers. There was also emphasis on consideration for different learning styles and background for making the programme more inclusive.

**Imbalance in Study Period:** The students expressed their concern about the workload in the study periods being highly unbalanced. Some students stated that balancing the workload and ensuring a

manageable distribution of courses, throughout different study periods, can enhance their learning experience.

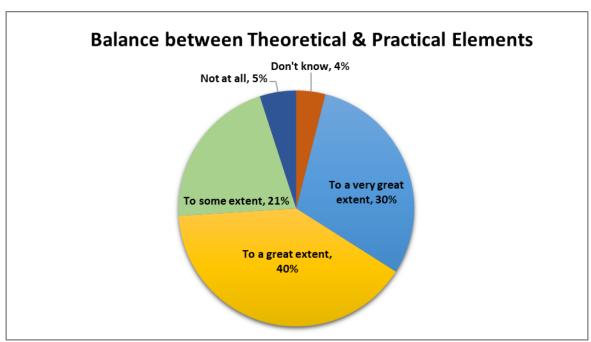
**Redundancy:** Some courses were perceived as being redundant, there were suggestions to reduce the overlap and introduce different perspectives of concepts. The timing of the courses offered was another issue raised by the students, they thought the course could be organised in a better way to ensure smooth learning experience.

**Exam & Assignments:** Some exams were reported to be very simple and did not lead to critical thinking, it was heavily dependent on memorization rather than practical application of theoretical concepts. Some students expressed their desire to have more challenging courses in the final year of the programme.

**Pre-requisites:** There were concerns about the high entry requirements and certain courses creating a blocking point, affecting the student's ability to continue or receive financial support.

### 7. To what extent do you consider that there has been a well-balanced division between theoretical and practical/skills-based elements in the programme?

Out of the 777 respondents, 40% agreed "to a great extent" that there was a balance between theoretical and practical elements in the programme. Around 30% thought there is a balance "to a very great extent" whereas 5% believed there is an imbalance. When analysing the text response, it was evident that a group of students expressed their desire to have more practical elements in the courses whereas another group appreciated the theoretical foundation provided in the courses, while recognising the importance of practical elements as well. The responses reflected a varied opinions about the practical-theory balance in the courses.



### 7.1 Strengths

**Balance between theory and practice:** The projects, labs, workshops, and assignments which focussed on applying theoretical knowledge in real-world scenarios were greatly appreciated by students.

Students acknowledged that some courses were successful in integrating practical application and theory.

**Project- based courses:** Some project-based courses with group tasks were identified a platform and an opportunity for hands-on learning and application of theoretical concepts, encouraging collaboration.

### 7.2 Areas if Improvement

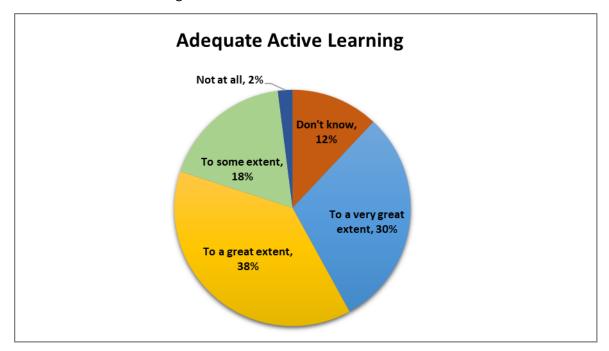
**Imbalance between theory and practice**: Some students raised concerns about lack of even distribution and lack of focus on practical assignments or exercise with real-world applications. There were also suggestions on improving the sequence and the structure of courses, giving an early handson training and early exposure to practical aspects to achieve the balance.

**Collaboration with industry:** Students thought they could get insights into industry practices with collaboration with companies, industrial visits and internships. Students also desired more time towards practical training and more interaction with teachers and supervisors of the programmes.

**Dynamic environment:** Students emphasized on adapting to the changing needs of the industries and aligning the courses with current industry needs and technologies.

### 8. To what extent do you consider that the level of active learning has been adequate in the programme?

When analysing if the level of active learning had been adequate in the programme, 38 % of the 777 respondents thought there was adequate active learning "to a great extent" while 2% responded that there was no active learning at all.



The text responses showed that the students had varied opinions about active learning. Whilst some courses were appreciated for being of very good quality and having active learning opportunities, some other courses were assessed for lacking in active engagement.

### 8.1 Strengths

**Active lectures:** Students identified and appreciated effective teaching methods, quality in instructions, active lectures, group assignment/sessions, engaging discussion with peers in certain courses which promoted active learning. The structure of having regular assignments and other submissions enhanced continuous learning.

**Workshops and seminars:** Traditional lectures accompanied by practical workshops, seminars and group presentations also facilitated active, interactive, and collaborative learning. Students perceived these as a platform and an opportunity for discussions and knowledge sharing. But some student raised concern about poorly organised workshops/seminar leading to confusions. Students liked the opportunity to ask questions during live lectures on Zoom since it allowed students to clarify their doubts in real-time.

### 8.2 Areas of improvement

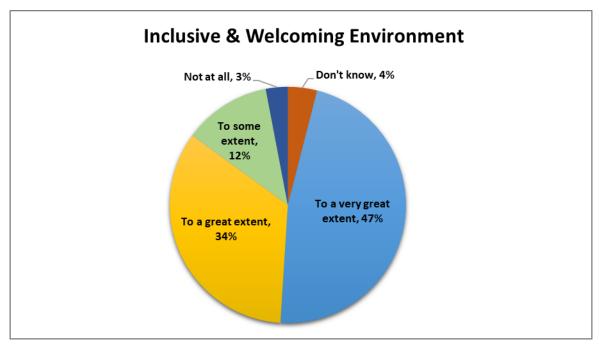
**Lack of student-led session:** Students wished they had more student-led discussions and sessions which could contribute towards their learning process.

**Lack of clarity on "student active forms of learning":** There were many students who were not sure what "student-active forms of learning" means. This could be indicative of the fact that the active form of learning is not clearly communicated to the students in the programmes.

**Smaller groups:** Some students think learning would be more effective if there are smaller number of students in a group for seminars and other activities. Smaller groups would facilitate active participation and collaboration.

### 9. Do you consider that BTH has a welcoming and inclusive learning environment?

Out of the 777 respondents, a noteworthy majority (47 %) perceived BTH to be welcoming and inclusive "to a very great extent". The text responses highlight the need for improvement in student activities, outdoor facilities, teaching quality and also recognizes welcoming and motivating teachers for inclusive study environment.



### 9.1 Strengths

**Inclusive study environment:** The text responses revealed that students appreciated welcoming and pleasant nature of the teachers. Individual interactions with teachers were also mentioned to be useful. Some of the study halls, the library and other spaces facilitated good study environment.

**Student activities and support:** Some of the students who identified themselves as international students acknowledged that there was adequate support and information provided to international students throughout their journey. Students stated that some social interaction and participation in student activity was possible if the students actively pursued them.

### 9.2 Areas of Improvement

**Lack of information:** Some students mentioned that information regarding study counsellors, different students' association, events or student activities on campus did not reach the new students. This posed as challenge, especially, for those students who did not have any connections and they missed these opportunities of socialising. There were some suggestions for organising more social events and students' activities within the campus.

**Facilities on campus:** While some students were happy with the facilities on campus, they also mentioned about shortage of amenities like, cafes, availability of water in the cafe and microwaves. Students highlighted the need for more group rooms for effective coordination during group work and group assignments and more study halls when it gets busy during exams.

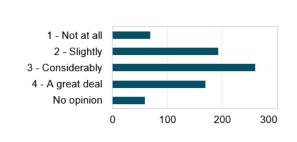
### The horizontal perspectives

The analysis is based on the aggregated scores of students' evaluations and open-response answers.

# Analysis of the 2023 programme evaluation of the Collaboration perspective

What follows is an analysis of the programme evaluation. The analysis is made by the coordinator of the Collaboration perspective, Andreas Larsson.

### How satisfied are you with the elements of interaction between your education and workplaces ?



	Number of responses	Distribution (%)
1 - Not at all	70	9%
2 - Slightly	193	26%
3 - Considerably	261	35%
4 - A great deal	170	23%
No opinion	60	8%
Total	754	100%

Mean	Standard Deviation	Median
2,8	0,9	3,0

#### Analysis of 2023 results

- Strengths of the perspective at BTH level
  - o In relation to the 2017, 2019 and 2021 programme evaluations, the upward trend has continued in terms of the number of students satisfied with the element of collaboration "to a high degree" or "to a very high degree" (46% in 2017, 47% in 2019, 54% in 2021). In the 2023 programme evaluation, the result is 58%.
  - Answers to the open-response items do not differ significantly from the 2017, 2019 and 2021 programme evaluations. Students request more guest lectures, study visits, student projects, etc. (as well as internships, where applicable). These elements, which provide insight into the reality of companies/organisations, and thus also into potential professional roles, are very often assessed as valuable. For those students able to participate in, and be involved with, these collaborative activities, they are often considered a strength of the programmes and courses. Events such as BAM, Arkipelago and the Creative Coast Festival are also mentioned in positive terms, although students find it unclear whether BTH contributes in various ways to these events.
- Changes implemented based on the 2021 programme evaluation
  - o Improved coordination between StudentRegion Blekinge and the perspective coordinator (also deputy vice-chancellor) regarding financial "lubricants" to encourage and facilitate programmes to implement collaborative elements in teaching. To this end, several events and collaboration activities have been cofinanced since the last programme evaluation.
  - Continuous dialogue between the deputy vice-chancellor and the vice president of the Blekinge Student Union regarding collaboration issues, e.g., marketing and organisation of BAM as well as corporate sponsorship of collaboration activities carried out by education associations.
  - Information meeting where the Blekinge Student Union, its education associations, and the line association PlanKan were invited by the perspective coordinator and the

coordinator for StudentRegion Blekinge to discuss how student-centred collaboration can be improved at BTH.

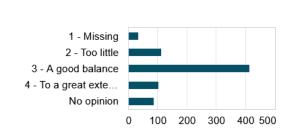
### • Areas of development

- Some students feel, in line with previous programme evaluations, that a discrepancy exists between how BTH presents collaboration in the programmes and how it works in practice in their individual programme. Students with many collaborative elements in their programme may find that collaboration is one of BTH's strengths, while students who did not participate in any study visits or guest lectures will naturally have a much more negative view of BTH's collaboration generally. Some students experience an almost total absence of guest lectures, study visits and student projects, while other students feel that their programmes and courses are well supplied with such collaborative elements. Student experiences also differ within the programmes, depending on the student's year, as some programmes have relatively few collaborative elements early on. Or, programmes begin with extensive collaborative activities in the first year, then reduce these elements. In addition, experiences with collaborative elements can vary from week to week and from course to course (e.g., effective collaborative elements in one course but not another). It should be mentioned that distance-learning programmes tend to have a weaker collaborative link in general.
- All programme directors shall be offered an annual interview with the coordinator of the Collaboration perspective so that they can examine the programme's need for support linked to collaborative educational elements.
- Regional science parks, clusters and incubators shall provide general information to their respective member companies regarding collaboration opportunities within the framework of BTH's degree programme.

# Analysis of the 2023 programme evaluation of the research-basis perspective

What follows is an analysis of the programme evaluation. The analysis is made by the coordinators of the research-connection perspective, Lars Lundberg and Göran Broman.

### What do you think about the connections with research within the programme?



	Number of responses	Distribution (%)
1 - Missing	35	5%
2 - Too little	113	15%
3 - A good balance	414	55%
4 - To a great extent	104	14%
No opinion	88	12%
Total	754	100%

Mean	Standard Deviation	Median
2.9	0.7	3.0

### Analysis of 2023 results

The response rate has increased to 32% from the previous programme evaluation (24%), which is positive.

The programme evaluation shows that a majority of the students (55% of respondents) experience a good balance with the research basis in their programme, i.e., most consider the amount of research basis in the programmes to be reasonable. Only 14% consider that there is too much research basis and only 20% consider that there is too little or no research basis. The remainder of respondents registered no opinion on the matter.

One change to the process, since the previous programme evaluation, is that the perspective coordinator now has access to all programme evaluations. An analysis shows that the overall picture described above also applies to each programme, with only minor deviations.

The open-response comments also indicate a good balance as well as diverging views, i.e., some students consider the amount of research basis reasonable, some students consider the amount excessive and some students consider it too little. The content of the research basis also drew comments, but these are difficult to summarise. For example, some students consider that there is too much theory while other students consider that there should be more theory.

As most students find the amount of research basis in the programmes to be reasonable, and given the diverging views on the subject, no specific measures are proposed beyond continued follow-up of the perspective according to current procedures.

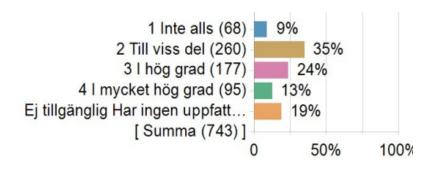
# Analysis of the 2023 programme evaluation of the Internationalisation perspective

What follows is an analysis of the programme evaluation. The analysis is made by the coordinator of the internationalisation perspective, Mats Walter.

Response rate: 754 responded to the question, of a total of 2,448 possible responses, yielding a response rate of 31%. Number of open-response answers 102.

Question posed: To what extent do you find that international perspectives are addressed in your courses and study programmes (e.g., in relation to the programme's subject content, course literature, exchange studies)?

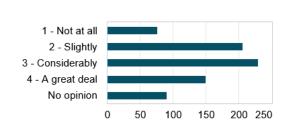
### In 2021, responses were distributed as follows:



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For the 2023 survey, the answers were:

To what extent do you consider that an international perspective is included in your programme (for example with regards to the programme content, the course literature, exchange studies)?



	Number of responses	Distribution (%)
1 - Not at all	77	10%
2 - Slightly	206	27%
3 - Considerably	230	31%
4 - A great deal	150	20%
No opinion	91	12%
Total	754	100%

 Mean	Standard Deviation	Median
2,7	1,0	3,0

#### **Analysis of 2023 results**

The 2023 results indicate that the international element of courses and study programmes has increased since 2021. On a very positive note, the percentage responding *high degree/very high degree* has increased, from 37% to 51% (in 2019, before the pandemic, it was 39%).

• Strengths of the perspective at BTH level

The open-response answers indicate that much of the course literature is in English, but nowhere does this pose a problem.

The opportunities to study abroad are positive, but it is important that this opportunity is in the latter part of the programme. Students draw attention to the problem posed by having an exchange semester so soon as the second semester of year 1.

The open-response answers also note the value of teachers with an international background and their perspectives/experiences.

Students emphasise the presence of international exchange students, usually in the latter part, as a positive feature.

In some programmes, students indicate that the programme is focused on Swedish circumstances (and exchange students are thus lacking) and that the international perspective is only highlighted in a single course.

• Changes implemented based on the 2021 programme evaluation

Strategic investment in three-year project "International student recruitment" finalised at the end of the year. Over the course of the project, international student intake (including Erasmus+) has increased, reinforcing the perception of BTH as an international campus. Of note is BTH's proportion of international students, which is among the best in the country. In terms of the proportion of feepaying students in 2022, BTH is only surpassed by KTH Royal Institute of Technology.

Areas of development

BTH has a goal that 20% of BTH students will, at some point during their studies, study at a higher education institution abroad. We are far from this target, and only about 5% of students study abroad. The new "Erasmus Charter for Higher Education (ECHE)", which lasts for the period 2021-2027, provides opportunities for studying abroad in the EU for less than one semester (especially BIP courses). This should facilitate goal attainment, as programme evaluations mentioned problems with finding sufficient and suitable courses at other higher education institutions.

More active outreach to students, to inform them about the possibilities of studying abroad, is also requested. A greater awareness (within BTH) of partner universities' course offerings is requested, to facilitate study abroad.

Work commenced on the formation of a European University (BAUHAUS4EU), with a total of 7 partners, which will certainly facilitate study abroad by harmonising courses among these institutions.

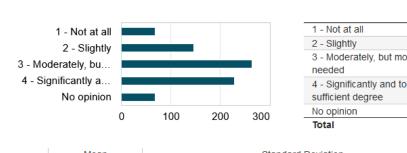
Students not participating in exchange programmes must also be exposed to an international perspective. This can be achieved through collaboration, in courses and projects, with international exchange students, contract students and freemovers.

Socialising outside of class is also important, in the form of joint student activities. However, the programme evaluation indicates a lack of information regarding BTH events and activities for international students. Interaction between international and domestic students must be improved. This is both to gain greater international perspective in the programmes and to ensure that BTH remains an attractive alternative for contract students within and beyond the EU and freemovers.

# Analysis of the 2021 programme evaluation of the Sustainability perspective

What follows is an analysis of the programme evaluation. The analysis is made by the coordinator of the perspective, Cecilia Bratt.

Do you consider that sustainable development is included in your programme in a way that both motivates and equips you to be able to contribute to sustainable development in your future professional role?



Total	777	100%
No opinion	69	9%
4 - Significantly and to a sufficient degree	229	29%
3 - Moderately, but more is needed	264	34%
2 - Slightly	146	19%
1 - Not at all	69	9%

Number of responses Distribution

(%)

Mean	Standard Deviation	Median
2,9	1,0	3,0

#### **Analysis of 2023 results**

• Strengths of the perspective at BTH level

It is possible that many (63%) consider that sustainability is included to a high or very high degree, which motivates them for the future, but it cannot be deduced from this which interpretation of 'high degree' or 'very high degree' is made. Unfortunately, no direct general strengths can be deduced from the programme evaluation's open-response comments, other than perhaps that several individuals feel that they have received a good foundation in sustainable development.

• Changes implemented based on the 2021 programme evaluation

Initiated dialogues with programme directors of bachelor's programmes to strengthen integration across several courses.

Areas of development

More time needs to be created so that sustainable development can be planned with good progression throughout the programme.

More time is needed to improve sustainable development skills among teaching staff. The basic course needs to be better at considering values, be more 'fun' and, above all, be better at capturing those students who obviously hate the concept of 'sustainable development' and strongly question the need for it to enter higher education at all. These are becoming more and more numerous, and a large divergence in values has formed

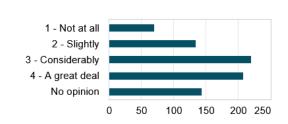
between these students and others, who believe that sustainable development should be at the centre of higher education, which needs to be addressed.

More resources need to be allocated to develop and run courses together across several departments.

# Analysis of the 2023 programme evaluation of the Gender-Equality perspective

What follows is an analysis of the programme evaluation. The analysis is made by the coordinators of the gender-equality perspective, Camilla Rüdén and Vicky Johnson Gatzouras.

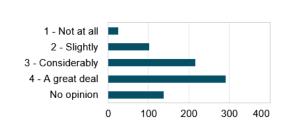
### To what extent do you consider that your education contributes with relevant knowledge about equality?



	Number of responses	Distribution (%)
1 - Not at all	70	9%
2 - Slightly	135	17%
3 - Considerably	220	28%
4 - A great deal	208	27%
No opinion	144	19%
Total	777	100%

	Mean	Standard Deviation	Median
	2,9	1,0	3,0

### To what extent do you consider that your education is undertaken in a way that takes equality into consideration?



	Number of responses	Distribution (%)
1 - Not at all	26	3%
2 - Slightly	103	13%
3 - Considerably	217	28%
4 - A great deal	292	38%
No opinion	139	18%
Total	777	100%

Mean	Standard Deviation	Median
3.2	0.9	3.0

### Analysis of 2023 results

Since the previous measurement, in 2021, the questions in the programme evaluation have changed, making comparisons with previous years' measurements difficult. In previous surveys, the question has been formulated as follows: "How satisfied are you with the way the work on gender equality is conducted in your programme?" In the 2023 programme evaluation, the question has been reformulated to examine 1) the extent to which courses and study programmes contribute relevant

<sup>&</sup>lt;sup>1</sup> The percentage of students answering "to a very high degree" or "to a high degree" to this question in previous programme evaluations has been around 54%.

knowledge about gender equality and 2) the extent to which courses and study programmes are implemented in a way that takes gender equality into account.

To the first question, 'To what extent do you consider that your courses and study programmes contribute relevant knowledge about gender equality?', 55 per cent of respondents answered 'to a very high degree' or 'to a high degree'. 26 per cent responded that they consider that courses and study programmes contribute relevant knowledge about gender equality "to some degree" or "not at all". 19 per cent of respondents have answered 'I don't know' on this question.<sup>2</sup>

In response to the second question, 'To what extent do you feel that your courses and study programmes are implemented in a way that takes gender equality into account?', 66 per cent of respondents answered 'to a very high degree' or 'to a high degree'. 16 per cent responded that they believe that the training is "to some degree" or "not at all" carried out in a way that takes gender equality into account and 18 per cent answered "I don't know" to the question.

Analysis of the open-response questions shows that respondents sometimes experience difficulty in distinguishing between the questions, i.e., whether courses and study programmes contribute relevant knowledge about gender equality or courses and study programmes take gender equality into account in their implementation. It can be deduced from responses that many respondents do not distinguish between gender equality in the content of the programme and gender equality in the actual implementation of the programme. This makes the answers no less relevant for the analysis of the survey - to the contrary, they are in many cases very rich in content - but the questions can be further clarified for the next programme evaluation.

### Strengths of the perspective at BTH level

A majority of respondents (55% in the first question and 66% in the second question) are satisfied to a high or very high degree with the knowledge of gender equality that courses and study programmes contribute, and that they are implemented in a way that takes gender equality into account. The students' open-response answers state as follows: "We have read a lot about gender equality and ethics in the programme", "We have talked quite a lot about gender equality during the programme, and it has been good!", "Gender equality often comes up. A good mix of male and female speakers".

Several respondents highlight the nursing programmes: "Equality and [how] we should be towards each other, patients and relatives are more or less highlighted in every course", "Studying care of the

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<sup>&</sup>lt;sup>2</sup> In 2019, 35 per cent of the responding students answered "I don't know" to the question "How satisfied are you with the gender-equality work in your courses and study programmes?" To the new question, far fewer people gave this answer.

elderly and focusing on a more equal society for our elderly as well", "Nurse programme... Is good at raising questions about gender equality', 'We discuss gender equality among healthcare staff but also among patients. Also equality, regardless of gender".

Courses in sustainability and design are also highlighted as examples that contribute to relevant knowledge about gender equality: "The only time I have come across it was in Sustainability Development, where I discussed why the games industry is not gender-equal, and how to go about making it [more] equal", "We are always encouraged to consider ethical design. Not being egocentric in our design choices", "Fortunately, I had a chance to participate in a great course named "Social Sustainability in Product and service development" which follows equality as educational material and made me motivated to participate in this domain".

In several answers to open-response questions, respondents emphasise their satisfaction with their treatment by teachers and classmates: "Always trying to divide up groups with a view to gender equality", "I have not perceived any form of discrimination during my studies", "I see no issues when it comes to equality" and "The fact that men and women interact, co-operate and respect each other has been self-evident from the beginning to the end. Interaction between teachers has also contributed to this perception".

### Changes implemented based on the 2021 programme evaluation

### 1. Measures taken in the field of gender equality in education

The following activities have been implemented since the 2021 programme evaluation to contribute to gender mainstreaming in education:

- 1. According to established procedures, during the introduction weeks at the beginning of each semester, all new students were offered a positive-learning-environment workshop, focusing on the promotion of gender equality and inclusion as well as the prevention of discrimination and harassment.
- 2. All new students were invited to an independent study on Canvas about positive learning environments, with a focus on gender equality and inclusion.
- 3. A more comprehensive survey of student perceptions regarding gender equality at BTH was conducted in the spring of 2022. Responses were presented at the Programme Director's Day, where measures were also discussed.
- 4. A leadership training course, with an element of gender equality, was conducted for the board of the Student Union in autumn 2022.
- 5. A lecture on gender equality was organised for the boards of the Student Union and line associations in spring 2023.
- 6. Simon Häggström, police officer and author of books on human trafficking and prostitution, gave a lecture at BTH in autumn 2022.
- 7. A gender mainstreaming web course for teaching staff has been developed during the winter/spring of '22–'23, and will be launched in the autumn of 2023.

8. The newly developed Degree of Bachelor of Engineering in Technical Game Graphics, starting in autumn of 2023, has received coaching with regard to gendermainstreaming perspectives in its curriculum and intended learning outcomes.

### 2. Measures taken in the field of gender equality in student recruitment

In 2022 and 2023, the special initiative on equal recruitment of students and new methods of reaching applicants of underrepresented gender has continued. In its student recruiting, BTH works long-term and systematically with norm-creative communication in all channels under the leadership of the Communications Office. Activities are carried out to influence gendered study choices, with a particular focus on engineering programmes. The programme *Tekniskt basår*, *på distans och på campus* has increased the proportion of female **applicants** from the previous year. A total of nine programmes have increased the share of female applicants, three engineering programmes are trending upwards, three are trending downwards and one remains the same. A total of six programmes have fewer female applicants in 2022. To attract more women to technology programmes in the long term, two "Technology Days for Girls" were held in 2022.

There is also a positive trend in terms of male/female representation among admitted students. The degree programme in product development remains within the 60/40 distribution from previous years. Spatial planning is once again within 60/40 after, in the previous year, women were over-represented. The Master's programmes in Urban Planning and in Strategic Spatial Planning also have equal representation. Many of the women who applied to *Tekniskt basår* also matriculated, which means that 27 per cent (distance-learning) and 22 per cent (digital) of the students are women. The new Design of Digital Experiences for Learning programme had, from the start, equal representation of women and men. Several more programmes show a positive trend. The Master's Programme in Strategic Leadership towards Sustainability has shifted to an underrepresentation of men, while the Bachelor's Programme in Digital Image Production has admitted 22 more male applicants compared to before and has achieved equal representation (within 60/40).

### Areas of development

The majority of respondents consider that the courses and study programmes contribute relevant knowledge about gender equality and that the gender-equality perspective is taken into account in their training, and the open-response answers indicate what students appreciated. We need to continue working on these areas to maintain satisfaction. Several respondents are less satisfied, and the open-response answers indicate areas for further development. Several students, in the open-response answers, state that knowledge about gender equality does not belong in courses and study programmes about, e.g., programming, software development, product development, computer security or at a technical institute at all: "I don't study product development to learn about gender equality", "I don't know what is meant. I'm studying maths and physics" or "What does this question have to do with software development?" Some feel insecure about 'what gender equality means for a university degree programme'. Anyone can apply for the programme if they want to. Do you mean that there are both female and male teachers?"

Others emphasise the "lack of relevant discussion and knowledge" on the issue, that "almost no course has mentioned the topic" or that gender equality "has not been discussed at all". These students request "knowledge about what a professional life and various industries look like after studies with regard to gender equality", that "the perspective be more prominent in both course literature and in the teaching in general", that it "has been discussed a few times but could definitely have been given more space", that the teaching could be "More interactive, inclusive, participatory and transformational", that "Gender equality, from several perspectives, in planning could definitely be taken up, as it is a central idea in our future profession and its importance for a democratic society", "Would have been great if it was more (linked to to spatial planning)" or "I think software engineering is more about code, I haven't heard much about gender equality". Perhaps would have been good if it was".

These responses show, overall, a lack of knowledge among a group of students about gender equality or an unwillingness to learn about the perspective in connection with the subject studies, while other students are positive about and request discussion of the subject in the courses and study programmes. One area for development is the way in which course and programme directors enable discussions with students about gender equality and its relevance to the industry and their subject. Course and programme directors should be offered both support and inspiration in this development work. Opportunities for workshops, coaching, best practices and exchanges of experience need to be created and implemented. The gender mainstreaming web course, which will be launched in the autumn of 2023, will be an important support to this work, as will subsequent workshops.

The open-response answers also show that students wish for more gender equality in their courses and study programmes, which is a development area for BTH: "I think the teaching contributes to gender equality, but I would have liked to see more female students", "Would have. wished for a class with people from more diverse backgrounds and more gender balance", "As the majority of board members around the world have an MBA education, I feel that the programme should ensure that intake is equal between women and men. Women are underrepresented on boards and also in this programme". The work to achieve a more equal representation of women and men is a continued development area in 2023 that requires further analysis of data on applicants to BTH's programmes and continued dialogue with interested parties to work for both norm-creative study choices and equal student completion.

Although the majority of students state that they have good experiences with equal treatment in courses and study programmes, and that the teaching is done in an equal manner, areas for improvement are highlighted in the free text responses:

"Have noticed that occasionally girls in the class have not received the attention from teachers that they deserve."

"Many teachers at the school are good at treating people equally. However, there are some teachers at the school who treat female students differently, which I think is a big problem... It is also noticeable that many male students have problems taking female students seriously

and this is something that BTH could highlight. For this reason, I understand why there are more men in the industry given the culture that starts in the first year when male students cannot listen to people who are not men."

"Relations between teachers and students [should] be equal and reciprocal, which some students can sometimes tend to forget. Teachers should behave well towards us students, and we students must behave well towards your teachers. I think it can be good to introduce and raise this from the start (even if it should be obvious), that we students not only have rights but also obligations."

The workshops offered to new students during the introduction week are an important part of increasing knowledge and prompting reflection on equal treatment and everyone's responsibility to help each other grow and thrive at BTH. One area for improvement is a clearer cooperation between programme directors, the Student Union, gender-equality coordinators, teachers and the Communications Office to increase workshop attendance.