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KOTAMO

Report on the state of equality and diversity in Finnish higher education institutions

Julia Jousilahti, Inkeri Tanhua, Juho-Matti Paavola, Leena Alanko,
Amanda Kinnunen, Jonna Louvrier, Liisa Husu, Maria Levola, Jenni Kilpi

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Report on the state of equality and diversity in Finnish higher education institutions

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Abstract

The objective of the KOTAMO project (2021–22) has been to examine the state of equality, non-discrimination and diversity among teaching and research staff in Finnish higher education institutions and to propose recommendations for measures to address the problems identified. The study focused on gender equality and ethnic diversity. The report is based on a literature review, a survey addressed to higher education personnel, interviews with personnel and workshops held with personnel and financiers. The project was funded by the Ministry of Education and Culture and implemented by Demos Helsinki, Oxford Research, Includia Leadership, Innolink, Inkeri Tanhua (Equality Research Helsinki), Liisa Husu and Kaskas.

The report showed that Finnish higher education institutions still have a great deal of work to do in promoting gender equality and ethnic diversity and that they need support in this work. The main challenges are related to the inadequate implementation of equality and non-discrimination plans, the relatively low number of women and ethnic minorities at the highest career stages in universities, non-transparent recruitment processes, poorer career development among ethnic minorities (when compared to the majority population), discrimination experienced by these minorities, and a non-inclusive working culture. Promoting equality and diversity requires actions, support for higher education institutions and more research.

Provision The conclusions and recommendations are those of the authors and do not necessarily reflect the opinions of the Ministry of Education and Culture.

Keywords non-discrimination, higher education institutions, equality, research, diversity

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KOTAMO

Selvitys korkeakoulujen tasa-arvon, yhdenvertaisuuden ja monimuotoisuuden tilasta Suomessa

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Tekijä/t	Julia Jousilahti, Inkeri Tanhua, Juho-Matti Paavola, Leena Alanko, Amanda Kinnunen, Jonna Louvrier, Liisa Husu, Maria Levola, Jenni Kilpi	
Kieli	Sivumäärä	124

Tiivistelmä

KOTAMO-hankkeen (2021–22) tavoitteena on ollut selvittää opetus- ja tutkimushenkilökunnan tasa-arvon, yhdenvertaisuuden ja monimuotoisuuden tilaa suomalaisissa korkeakouluissa sekä ehdottaa toimenpidesuosituksia havaittuihin ongelmiin vastaamiseksi. Selvitys keskittyi tarkastelemaan sukupuolten tasa-arvoa ja etnistä monimuotoisuutta. Selvitys perustuu kirjallisuuskatsaukseen, korkeakoulujen henkilöstölle osoitettuun kyselyyn, henkilöstön haastatteluihin sekä henkilöstön ja rahoittajien kanssa pidettyihin työpajoihin. Hankkeen rahoitti opetus- ja kulttuuriministeriö ja sen toteuttivat Demos Helsinki, Oxford Research, Innolink, Includia Leadership, Inkeri Tanhua (Equality Research Helsinki), Liisa Husu ja Kaskas.

Selvityksestä ilmeni, että sukupuolten tasa-arvon ja etnisen monimuotoisuuden edistämisessä on vielä paljon tehtävää suomalaisissa korkeakouluissa ja ne tarvitsevat tukea tässä työssä. Keskeiset haasteet liittyvät tasa-arvo- ja yhdenvertaisuussuunnitelmien vajavaiseen toimeenpanoon, naisten ja etnisten vähemmistöjen suhteellisesti alhaiseen määrään ylimmillä uraportilla yliopistoissa, läpinäkyttömiin rekrytointiprosesseihin, etnisten vähemmistöjen valtaväestöä heikompaan urakehitykseen sekä näiden kokemaan syrjintään, ja epäinklusiiviseen työkulttuuriin. Tasa-arvon ja monimuotoisuuden edistäminen edellyttää toimia, tukea korkeakouluille ja lisää tutkimusta.

Klausuuli	Raportissa esitetyt päätelmät ja suositukset ovat kirjoittajien omia, eivätkä välttämättä edusta opetus- ja kulttuuriministeriön kantaa.		
Asiasanat	yhdenvertaisuus, korkeakoulut, tasa-arvo, tutkimus, moninaisuus		

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KOTAMO

Utredning om jämställdhetens, likvärdighetens och mångfaldens läge i Finlands högskolor

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Språk	Sidantal	124

Referat

Syftet med Kotamo-projektet (2021–22) har varit att utreda situationen för jämställdhet, likabehandling och mångfald bland undervisnings- och forskningspersonalen vid de finländska högskolorna samt att föreslå åtgärdsrekommendationer för att svara på konstaterade problem. Utredningen fokuserade på att granska jämställdheten mellan könen och den etniska mångfalden. Utredningen baserar sig på en litteraturöversikt, en enkät riktad till högskolornas personal, intervjuer med personalen samt workshoppar med personalen och finansierarna. Projektet finansierades av undervisnings- och kulturministeriet och genomfördes av Demos Helsinki, Oxford Research, Innolink, Includia Leadership, Inkeri Tanhua (Equality Research Helsinki), Liisa Husu och Kaskas.

Utredningen visade att det fortfarande finns mycket att göra för att främja jämställdhet och etnisk mångfald vid finländska högskolor och att de behöver stöd i detta arbete. De viktigaste utmaningarna gäller det bristfälliga genomförandet av jämställdhets- och likabehandlingsplanerna, det relativt låga antalet kvinnor och etniska minoriteter på de högsta karriärstegen vid universiteten, ogenomskinliga rekryteringsprocesser, en svagare karriärutveckling för etniska minoriteter än för majoritetsbefolkningen samt diskriminering som dessa upplever och en icke-inkluderande arbetskultur. Främjandet av jämställdhet och mångfald förutsätter åtgärder, stöd till högskolorna och mer forskning.

Klausul

De slutsatser och rekommendationer som förekommer i rapporten är skribenternas egna, och representerar inte nödvändigtvis undervisnings- och kulturministeriets ståndpunkt.

Nyckelord

likabehandling, högskolor, jämställdhet, forskning, mångfald

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1 Introduction

The KOTAMO project, carried out in 2021–2022, examined the state of equality, non-discrimination and diversity among teaching and research staff in Finnish higher education institutions, as well as the ways in which the institutions have promoted these aspects. Moreover, the project surveyed the measures adopted in reference countries to promote gender equality, non-discrimination and diversity. Finally, the project offered recommendations for measures that can help promote equality, non-discrimination and diversity in higher education institutions. Topics examined in the KOTAMO project included recruitment, career development and the equality and non-discrimination of the atmosphere at work. The project was funded by the Ministry of Education and Culture (MoEC), and it was carried out by Julia Jousilahti and Leena Alanko (Demos Helsinki), researcher Inkeri Tanhua (Equality Research Helsinki), Juho-Matti Paavola and Maria Levola (Innolink), Amanda Kinnunen (Oxford Research), Jonna Louvrier (Includia Leadership), Professor Liisa Husu and Liisa Mayow (Kaskas Media).

Questions related to gender equality, non-discrimination and diversity apply to a wide range of groups and topics. This project focused on teaching and research personnel, and the emphasis was placed on gender and ethnic (in)equality. These topics are handled both separately and intersectionally – together, that is – as permitted by the material. Equality, in this context, encompasses both gender and ethnic equality. Diversity is examined from the perspective of groups – the degree to which workplace communities represent different groups, including minorities. In workplaces, the promotion of equality is expected to increase diversity and reduce discrimination.

This report is based on comprehensive material, comprising literature and statistics supporting the assessment of equality, non-discrimination and diversity in Finnish higher education institutions, international examples from literature and interviews, an online survey, individual and group interviews, as well as co-creation workshop results. In most of the literature reviewed, gender equality refers to equality between women and men. Literature dealing with the equality of gender minorities, as well as equality regardless of gender identity or gender expression is also presented. The literature review was used as the basis for an online survey that received nearly 2,800 responses. The goal was to obtain information about the teaching and research staff's views and experiences about the realisation and promotion of gender equality and non-discrimination, as well as the key

problems related to these. These questions were also studied with the help of individual and group interviews.

A series of three co-creation workshops was organised during the project. The goal of the co-creation workshops was to validate and further develop the observations and recommendations of and good practices identified in earlier project stages for promoting gender equality, non-discrimination and diversity in Finnish higher education institutions together with the institutions and funders. The international review aimed to collect information about ways in which the reference countries had successfully promoted gender equality, non-discrimination and diversity among the staff at higher education institutions. The choice of the four reference countries – Sweden, Norway, Spain and Ireland – was motivated by the countries offering interesting practices and measures for promoting gender equality and non-discrimination.

The final report is divided into eight chapters. The introduction is followed by a discussion about gender equality and the career development of teaching and research staff in the light of the research literature, statistics, survey results and individual and group interviews. Each chapter follows the same use of materials. Chapter three focuses on ethnic equality among teaching and research staff, while chapter four deals with gender equality and ethnic equality in recruitment. In chapter five, we examine the experiences of gender equality and non-discrimination in the work community. Chapter six discusses approaches to promoting gender and ethnic equality, and chapter seven succinctly summarises the reference countries' best practices for promoting gender equality, non-discrimination and diversity. (More detailed descriptions of the practices are included in Appendix 2 and as separate publications in the country reports available on the website of the Ministry of Education and Culture.) Chapter eight provides recommendations to higher education institutions, funders and national operators. The concluding words in chapter nine are followed by the appendices, which describe how the study was carried out. The literature review, survey results and country-specific reports of good practices have been published as separate documents on the KOTAMO website at <https://okm.fi/kotamo>.

2 Gender equality and career development of teaching and research staff

The literature on academic careers used as material in the KOTAMO project treats gender as a social, cultural and physical dimension. Examples of topics examined include the role that gender plays in practices, structures and knowledge production, causing divisions and distinctions in society and organisations, the type of information that is appreciated and considered of academic excellence and how the author affects this view.

The key findings related to gender equality and the career development of teaching and research staff include the following:

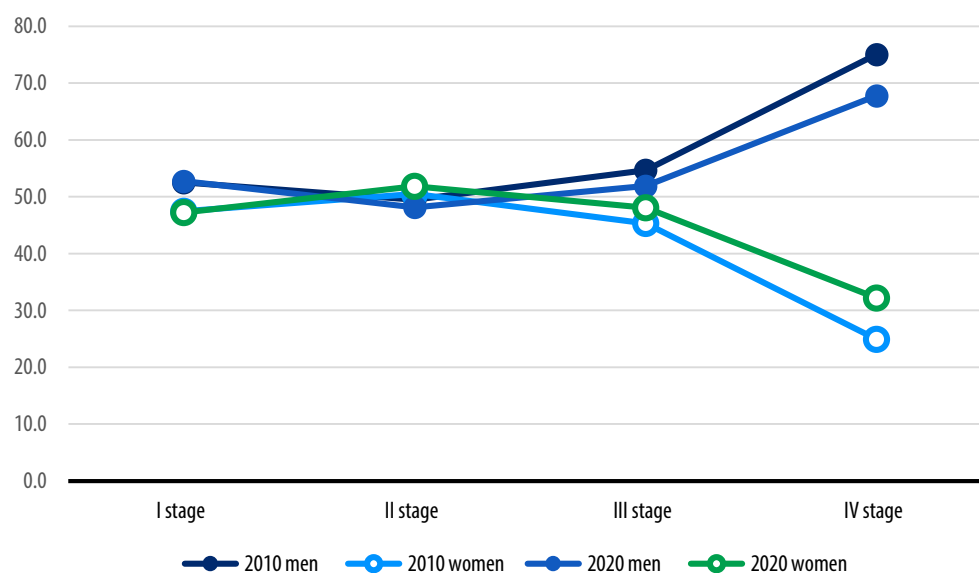
- Proportionally fewer women than men reach the top of the career ladder in universities. The number of women at the professorial level also varies a great deal depending on the field.
- In universities of applied sciences, all positions are, on average, dominated by women. However, there is great variation in the proportion of women and men depending on the university of applied sciences.
- The most significant gender disparities in career development were seen in the fixed-time nature of women's employment relationships, especially in universities. A similar gendered difference was detected in all academic fields of science. Gender disparities such as these were not observed in universities of applied sciences.
- The interviews and literature review highlighted the experience that some fields dominated by women are not appreciated as highly, which results in poorer resourcing.
- Plans promoting gender equality and non-discrimination do not adequately translate into practical measures.
- Various forms of implicit discrimination underlie the problems that women face in their academic career. These include the accumulation of small things and events that do not materialise, so called non-events (e.g. inadequate supervision for the doctoral dissertation or not being invited to events, projects and networks) (Husu, 2021), the narrow definition of academic excellence based on the publication of articles in specific journals, which puts pressure especially on women researchers with many teaching duties and small children (Lund, 2012), as well as subconscious attitudes that lead to unfair treatment.

- Very little research has been recently carried out in Finland on the gendered careers of university teaching and research staff and any related practices creating inequality.
- As for universities of applied sciences, hardly any Finnish research has been carried out on the gendered careers and segregation of teaching and research staff or related practices creating inequality.

2.1 Gender scissors and other statistics

In universities, the most obvious statistical indication of gender inequality is the “gender scissors” that continue to clip the academic careers of women at the top rungs. The term gender scissors is used to refer to a gender structure in which female undergraduate students outnumber their male peers, but the number of men holding top positions in academia exceeds by far that of women. In Finnish universities, the distribution of women and men is quite even at all other career stages except for the professorial level, where women only account for 32.2 per cent of the staff.

Figure 1. Gender distribution of academic research and teaching staff at different career levels in 2010 and 2020, percentage of labour units. (Vipunen – Education Statistics Finland: University personnel.)



There is great variation in the number of women at the professorial level in different fields. Table 1 depicts the proportion of female professors in different fields of science in Finland,

Sweden, Norway, Spain and the EU on average in 2018. Compared to the EU average and the reference countries, Finland has considerably fewer female professors in science and engineering. Instead, the number of female professors in agricultural sciences, social sciences and arts and humanities is notably higher than the average. Finnish universities differ from their Swedish and Norwegian counterparts especially in the low number of female professors in science and technology. Compared to Spain, the difference is that Spain does not have as many women as professors in the social sciences and arts and humanities. In agriculture and forestry, Finland is a clear exception with a clearly higher proportion of women compared to all the reference countries.

Table 1. The proportion of women at the professorial level (full professor, grade A) in different fields of science in Finland, Sweden, Norway, Spain and Europe on average in 2018, % (European Commission 2021, p. 190). (The data for Ireland are not yet available, which is why Ireland is not reported here, even though it is one of the countries selected for the international survey in the KOTAMO project.)

	Natural sciences	Engineering and technology	Medical sciences	Agriculture and forestry	Social sciences	Arts and humanities
EU-27	21.99	17.91	30.08	28.50	30.85	34.95
Finland	15.28	10.07	33.40	40.63	37.71	47.31
Sweden	18.69	16.88	32.94	32.94	35.10	38.87
Norway	19.57	14.23	43.85	21.82	33.92	36.36
Spain	22.21	15.54	27.69	20.33	25.54	30.69

Table 2 depicts the proportion of women in the teaching and research staff of Finnish universities of applied sciences. The teaching and research staff of universities of applied sciences has not been grouped by career stage. The table depicts the number of women working as lecturers, principal lecturers, hourly-paid full-time teachers and members of the RDI staff. Examining all the universities of applied sciences, the average proportion of women is smaller among principal lecturers (51.6 per cent) than among lecturers (62.9 per cent) and hourly-paid teachers (57.8 per cent). Taken on average, women are in the majority in all positions. However, there is great variation between universities of applied sciences. The proportion of female principal lecturers is highest at the Humak University of Applied Sciences (78.0%) and the lowest at Centria University of Applied Sciences (37.7%). In all universities of applied sciences, more than half of the lecturers are women.

Table 2. The proportion of women among teaching and research staff of universities of applied sciences in 2020, % labour units. (Vipunen – Education Statistics Finland: University personnel.)

	Lecturer	Principal lecturer	Hourly-paid full-time teacher	RDI staff
All universities of applied sciences, total	62.9	51.6	57.8	50.9

Table 3 depicts the proportion of women of the personnel and principal lecturers in universities of applied sciences in five fields of science in 2020. Compared to the number of women holding university professorships in different disciplines, universities of applied sciences are also more female-dominated at the level of principal lecturers. For example, the staff in the field of health and wellbeing is very female-dominated, and more than 90 per cent of the principal lecturers are also women. There are also slightly more women than men as principal lecturers in the social sciences, arts and humanities. While the fields of science, engineering and technology are also male-dominated in universities of applied sciences, the proportion of female principal lecturers is nevertheless larger than that of female professors in the same fields of science in universities.

Table 3. The proportion of women of the staff and principal lecturers in universities of applied sciences in six fields of sciences, per cent of labour units. (Vipunen – Education Statistics Finland: University personnel.)

	Natural sciences	Engineering and technology	Health and wellbeing	Agriculture and forestry	Social sciences	Arts and humanities	Data missing
% of women of staff	33.1	23.3	90.0	53.5	66.4	65.6	0.0
% of women of principal lecturers	19.9	21.5	91.1	39.3	54.9	57.9	0.0
% of women of RDI staff	30.3	30.4	77.7	66.5	69.8	70.7	37.2

In terms of universities of applied sciences, we also examined pay differences between women and men, as well as average pay in different fields of science. A comparison of

different fields was carried out based on the teachers' field of education. According to the comparison, a female lecturer at a university of applied sciences earns on average EUR 4,708 a month, compared to EUR 5,095 earned by their male colleague. Significantly higher salaries were found in the fields of engineering and science, while lower salaries were recorded in the fields of health and wellbeing and the field of arts and humanities. The average overall salary of lecturers trained in the field of engineering and technology was EUR 5,389 and lecturers trained in the field of health and wellbeing EUR 4,669. In terms of monthly wages, the difference in salary between these fields was EUR 720, which amounts to EUR 8,640 at an annual level. Most of the gendered salary differences among lecturers can be explained by the differences between the fields. However, gendered salary differences were also found within some fields. In the male-dominated field of engineering and technology, the overall salary of female lecturers was EUR 5,164 and that of male lecturers EUR 5,448.

2.2 Gendered career development – what the survey tells us

In the survey for teaching and research staff of higher education institutions, the respondents' experiences of their career development indicated some differences based on gender, but these differences were not as pronounced as they were in other materials. Indeed, the experiences of both female and male respondents often resembled one another.¹

The most significant differences in terms of gendered career development observed in the survey were related to the uncertainty of employment relationships, especially in universities. More than half of the female respondents from universities had a fixed-term employment contract without a tenure track option, compared to less than 40 per cent of men in the same situation (see Table 4). A similar gendered difference was detected in all fields of science. Gender disparities such as these were not observed in universities of applied sciences.

¹ The results of the questions discussed here are reviewed in greater detail in the separate survey report, in Appendix 2, chapters 2.6, 2.7 and 4. The report is available on the KOTAMO website at <https://okm.fi/kotamo>.

Table 4. Employment relationship based on gender.

	Univ. of appl. sci., men	Univ. of appl. sci., women	University, men	University, women
Permanent	75.6%	75.0%	39.7%	31.7%
Fixed-term, with tenure track	-	-	6.9%	5.8%
Fixed-term, without tenure track	-	-	38.7%	50.2%
Grant	-	-	8.6%	9.0%
Fixed-term	24.1%	24.6%	-	-
Other type	0.3%	0.4%	6.0%	3.3%

No gender-based differences were identified in the duration of fixed-term contracts, but successive contracts were more common among women respondents, especially in universities. Long chains of more than 11 fixed-term contracts were more than twice as common among women respondents than men respondents in universities. In universities of applied sciences, multiple successive fixed-term contracts were slightly more common among men (see Table 5).

Table 5. Number of successive fixed-term contracts by gender.

	Univ. of appl. sci., men	Univ. of appl. sci., women	University, men	University, women
1–2	54.7%	61.6%	44.7%	37.7%
3–5	29.7%	28.5%	34.4%	35.3%
6–10	12.5%	7.6%	15.4%	14.3%
11+	3.1%	2.3%	5.5%	12.8%

Different experiences of insecure employment relationships also influenced the way in which respondents viewed their chances of continuing an academic career. Of the women respondents employed by universities, 20 per cent said they would like to continue their career at a higher education institution but did not believe it was possible, compared to 14 per cent of men respondents who thought the same way. In universities of applied sciences, 12 per cent of men did not believe they could continue their career, while the corresponding proportion among women was 7 per cent.

When asked why the respondents did not believe they could or did not want to continue their academic career, especially the responses of women working in universities highlighted factors related to the insecurity of employment and income, as well as wellbeing at work. Compared to men, women also cited family-related aspects notably more often as the reason for leaving their academic career, but overall, these aspects did not have a big significance. The insecurity of employment was also the main reason for men respondents working in universities to drop their academic career, but compared to women, men also cited the level of pay notably more frequently as the reason, both in universities and universities of applied sciences (see Table 6). This can partly be explained by the gender segregation in different fields of science, as the level of pay was mentioned more frequently in the responses of those working in the male-dominated field of engineering and technology. The level of pay was also emphasised by respondents in the field of medical and health sciences. In these fields, the level of pay in duties outside universities, both in the public and private sectors, is higher than in, for example the arts, humanities and social sciences.

Table 6. The reasons why respondents did not believe they could continue their academic career or did not want to do so, based on gender.

	Univ. of appl. sci., men	Univ. of appl. sci., women	University, men	University, women
I am not allowed to or cannot perform the duties I want	19%	26%	14%	17%
Career advancement opportunities	27%	28%	43%	44%
Other reason	25%	24%	17%	12%
Level of pay	43%	26%	45%	36%
Family reasons	5%	11%	4%	10%
I did not originally plan to embark on an academic career	19%	29%	19%	17%
Uncertainty of income	17%	10%	36%	54%
Wellbeing at work	21%	27%	21%	38%
Content of work	17%	25%	10%	11%
Demands of work (e.g. publications)	14%	10%	25%	32%
Uncertainty of employment	25%	27%	54%	69%
Working environment	21%	19%	20%	25%

According to other indicators, no significant disparities in career development were identified between women and men respondents. As observed in the statistical review, the proportion of women on the top career ladder in academia is notably smaller than that of men. Statistics also indicate that gender disparities do not automatically level out as the older male-dominated professors retire but that development is slower. However, no considerable differences were noted between women and men respondents concerning the speed of career development. In the survey, respondents were asked to indicate the year they defended their doctoral thesis (if applicable) and the year in which they had obtained full professorship (if applicable). The number of years between these two was used as an indicator of the speed of career development. The average for women respondents was 11.9 years and that of men 12 years. Another indicator used was the number of years the respondents had spent at the university at II stage (postdoc/doctoral project researcher/university teacher) and at III stage (assistant professor with or without tenure track/university lecturer) since defending their doctoral thesis. This is not as clearly a defined indicator as the time since obtaining professorship. No gender disparities were noted in this respect either.

The respondents' experiences and opinions about career development in universities did not display considerable gender differences. This is somewhat surprising, considering women's more uncertain employment relationships and greater doubts about their chances of continuing an academic career, as well as the larger proportion of women respondents at lower career levels.

Generally speaking, the respondents were quite satisfied with their own position, career development and opportunities to advance in their academic career. University employees were, on average, slightly less satisfied with their career progress and the career advancement opportunities they envisaged for themselves in the future, compared to respondents working in universities of applied sciences. The averages of women and men respondents for all questions concerning their own career development were very similar (see Table 7). However, the responses concerning future career development, in particular, showed greater deviation than indicated by an examination of the averages alone. Of university-employed women, 21.0 per cent fully agreed with the statement on opportunities for career development, compared to 32.2 per cent of university-employed men. In turn, women respondents employed by universities of applied sciences reported slightly more frequently than their male peers that they were involved in networks, funding applications and the development of teaching. However, the differences in the responses of women and men were minor overall.

Table 7. Statements about career development, averages of responses based on gender on a scale of 1 = fully disagree ... 5 = fully agree.

	Univ. of appl. sci., men	Univ. of appl. sci., women	University, men	University, women
My roles, responsibilities and work duties match my work experience and competence	4.0	4.1	4.1	4.0
I am satisfied with my career advancement in higher education institutions	3.7	3.8	3.5	3.3
I feel I have the same opportunities to advance in a higher education institution as my colleagues holding similar positions	3.6	3.8	3.5	3.2
I believe career advancement in a higher education institution is important	3.7	4.0	4.1	4.2
I am involved in networks that conduct research and publish together	3.8	4.1	4.0	4.1
I am involved in joint funding applications	3.6	3.9	3.5	3.4
I am involved in the development of teaching	4.2	4.3	3.9	3.8

2.3 Gendered career development – what the interviews tell us

The results of individual and group interviews confirm many of the observations made in the literature review and the survey concerning gender equality in career progression and related problems in higher education institutions. The following section contains a thematic analysis of observations that have a direct or indirect impact on the equality of opportunities for career advancement among women and men in higher education institutions.

2.3.1 Gender equality is discussed more than before, but practical measures progress slowly

Equal opportunities for career advancement and the realisation of gender equality in general in higher education institutions were discussed in the individual interviews. While comments to the contrary were also heard, most of the respondents felt that progress had been made in gender equality and non-discrimination in higher education institutions. The promotion of gender equality is discussed more than before, and the importance of gender equality and non-discrimination is highlighted in the communication of higher education institutions. Gender equality and diversity have also been promoted in higher education institutions by setting up formal and informal groups to advance these themes and organise related events. Nevertheless, one of the respondents, who works at a higher education institution outside the metropolitan area, felt that gender equality and non-discrimination are discussed and addressed more in higher education institutions in the metropolitan area than outside it.

One of the reasons for the more active discussion and communication was considered to be the younger student generation, which actively demands that higher education institutions focus more attention on these themes. As described by one of the interviewees, there is “a generational gap between students and the teaching staff” in questions concerning gender equality and non-discrimination. A general observation made in individual interviews was that the interviewees emphasised aspects related to gender equality more than those concerning ethnic equality. Interviewees in both individual and group interviews felt that awareness and words do not necessarily turn into action. Strategic plans promoting non-discrimination do not yet adequately show as concrete measures. “The challenge is to put pretty plans into action. Plans as such are quite good, but their practical implementation is relatively slow,” said one of the interviewees. Several interviewees representing universities were also of the opinion that things happen randomly in universities. There are no clear practices. Instead of there being a common and consistent approach, faculties and smaller units, such as research groups, may show widely differing attention to gender equality and non-discrimination.

According to respondents from universities of applied sciences, equality plans are not implemented or reviewed with the staff. In the words of one of the interviewees: “I read through the equality plan and chuckled to myself – it was pretty utopian and had nothing to do with reality.” The respondents suspected that one reason might be that management assumes the organisation is already equal or that the importance of gender equality, non-discrimination and diversity is not yet fully understood at the management level.

One of the reasons for the failure to implement plans, put forth by the interviewees, is that gender equality questions and preventing discrimination have not yet attracted enough interest among university management for them to have been prioritised. Gender equality

plans have not yet materialised in practice, because sufficient HR and other resources, for example, have not been allocated to their implementation. As one of the interviewees stated, “you hear talk about gender equality on the International Women’s Day, but that’s it.” The interviews also brought up a few obvious cases of discrimination and inappropriate speech, including the reason for not hiring women “because we have so many women pregnant”. In some cases, comments had been made about something “being typical of women”, which in itself is discriminatory speech.

Some of the interviewees mentioned the lack of urgency to promote gender equality and suggested that this may be due to some people and groups in higher education institutions considering Finland to be a gender equal country, which would rule out the need for active efforts to promote gender equality. “We’re not a model country in gender equality, even though we often hear that.” A few interviewees felt that higher education institutions do not understand gender equality questions are sensitive and that problems related to gender equality change with time. Challenges related to equality, and thus the measures promoting it, were described as shifting with time: “There’s no status quo”, as one of the interviewees said. In recent years, the coronavirus pandemic and the ensuing pressures to change were also considered to have grabbed space from gender equality and non-discrimination efforts in higher education institutions.

2.3.2 Everyday challenges and prejudiced attitudes strengthen the gender scissors

Reasons for gender scissors cutting the academic career path were discussed during the interviews. Due to its precarious nature, an academic career was considered overall more challenging for young researchers and among them, especially for women: the uncertainty of an academic career, the fixed-term nature of employment contracts and competition between individuals makes the career especially challenging for them, and this also showed in the survey. Group interviews also highlighted practices in daily life, which make it difficult to combine family and career and thus undermine equal opportunities for career advancement in higher education institutions. For example, it is more difficult to take part in conference trips and after work events if you have children – and the responsibility for care continues to be shouldered more frequently by women. According to one of the interviewees, male colleagues appeared to be offered more opportunities for networking. The interviewees also pointed out that even though the number of female students has increased in many fields of science, it will take time for this change to show in academic career paths and their top levels due to careers in academia being so long.

Among teaching and research staff of universities of applied sciences, challenges to gender equality were seen especially in remarks about pay disparity. What is known as the “availability bonus” causes some difference in pay in universities of applied sciences. The bonus means that the level of pay of employees – including teachers – in certain fields is influenced by the availability of workforce in the field. In accordance with the availability bonus for the field of engineering and technology, teachers receive a bonus based on the agreed coefficient on top of their basic salary. The materials indicate that gender pay disparities in universities of applied sciences partly arise from the fact that payment of the availability bonus has often been limited to male-dominated engineering fields, which means that teachers in other fields, who nevertheless carry out similar duties, earn a lower salary. However, the statistics used in the KOTAMO project interestingly indicate that pay inequality exists invariably in all fields. In other words, the availability bonus cannot fully explain the gender pay gap among the teaching staff of universities of applied sciences.

Several interviewees offered examples of prejudices and attitudes that affect the kind of work and activities that are appreciated at higher education institutions. One of the interviewees working at a university of applied sciences considered it a problem that the organisation is managed like a business, which means that measurable results – such as the acquisition of funding – is appreciated more than work that produces more indirect results, such as teaching. Since women account for a large proportion of the teaching staff, the interviewee felt that this attitude disadvantages women in their career. The same interviewee also felt that it was more difficult for women to advance in their career because jobs seem to move through the old boys’ network.

Similar to the literature review, the individual interviews also brought up the low respect for female-dominated fields. An interviewee with a background as a professor, who represented the social sciences, said their field of research is considered “feminine”, which may affect the field’s popularity and trend among students. The low popularity of a discipline may mean small groups. This, in turn, may lead to the university not establishing a professorship in the field, and thus influencing the discipline’s status at the university. According to a few interviewees, their field of research influences the way they are treated in their higher education community. One of the interviewees said their expertise had been downplayed and the ability of the interviewee, as a representative of their own field of research, to analyse work in other research fields had been questioned.

It is interesting that in places, the interviews point at a problematic academic culture in general – the interviewees described disagreeable practices in the culture, such as the professors “testing” doctoral students by behaving unpleasantly. According to one of the interviewees, the threshold for reporting inappropriate behaviour to the harassment contact person is high. Despite universities having relevant guidelines in place, the interviewee believed that more emphasis should be placed on preventing such situations

instead of leaving the victim of harassment or discrimination to deal with the situation alone. It is possible that in competitive and hierarchical institutions with strong traditions, such as universities, old (harmful) operating methods take longer to change than in other environments. This may also be seen in how the interviewees experienced the university management's attitude to the promotion of gender equality and non-discrimination.

2.4 Reasons for gendered career development in research literature

Studies indicate that while some of the reasons for the slow decrease in gender scissors and other forms of inequality experienced by teaching and research staff may seem small when examined on their own, their accumulation can have major impacts. One form of implicit discrimination is the accumulation of small things that never materialise, so-called non-events. These also came up in the interviews conducted for the KOTAMO project. Things that fail to materialise can take the form of lacking support and encouragement, inadequate supervision at the doctoral thesis stage, slow reaction from supervisors to requests for reference needed for funding applications, not being invited to events, projects and networking, the invisibility of women or ethnic minorities in events and conferences in their own field, feelings of loneliness in academia, and the unwillingness of a female-dominated administrative staff to help female researchers in the same way as male researchers. (Husu, 2021).

Field-specific studies have delved deeper into the reasons for gendered careers in individual disciplines and departments. They have uncovered a number of difficulties in the use of family leave (Huopalainen and Satama, 2019; Vehviläinen, Korvajärvi, and Ylijoki, 2021), described the field-specific mechanisms of implicit discrimination (Kantola 2008; Kantola 2005), explained the strain caused by the pressure to publish (Lund, 2012) and described how the habit of defining academic excellence based on publications in top scholarly journals can create inequality. Research into gender equality in academia has been conducted for quite a while in Finland, but especially in recent decades, the amount of research has been small compared to that of Sweden, for example. Therefore, the review of Finnish research also includes slightly older, but significant studies. Not much research has been conducted on gender inequality concerning the staff of universities of applied sciences, which is why universities of applied sciences do not figure prominently in this chapter, even though they also merit to be studied.

One of the pioneering Finnish studies on inequality describes gendered career development at the Department of Political Science at the University of Helsinki in 2004–2005 (Kantola 2005; Kantola 2008). Although the study was conducted nearly

twenty years ago, and the inequality-generating mechanisms have partly changed since the material was collected, the study still forms an important foundation for later research. In the years studied (2004–2005), women accounted for half the undergraduate students and 38 per cent of doctoral students, but only 18 per cent of those who successfully defended their doctoral thesis. The study analyses how gendered practices can explain such figures. According to the study, the “typical route” to a research position in the department, as described by the men working in the department, was not possible for women. The disparities were related to the doctoral supervision offered to women and men, the distribution of teaching duties accumulating merit mainly to men (91 per cent of the courses given by doctoral students were held by men), gendered biases and implicit discrimination. In many cases, the women who were interviewed were not even aware of teaching opportunities, whereas many of the male interviewees had good experiences of teaching duties. In addition, many of the women felt that their wider definition of politics did not fit well with the Department’s typical thinking, and their dissertation topic therefore sidelined them. (Kantola 2008; Kantola 2005). The study aptly described how multiple small, implicit practices pushed women to leave the department at a time when research careers were typically pursued in the same department.

In later research, teaching duties contribute to inequality in new ways. Although the mechanisms that generate inequality change, inequality does not automatically decrease. While some teaching duties are still valued in research careers, these days, an excessive accumulation of teaching duties that do not impart merit is considered to slow down a research career, as the pressure to publish “excellent” research has increased instead. A study on Aalto University deals with the increasing pressure to publish facing people pursuing academic careers, and the focus is specifically on women researchers who handle a lot of teaching and have small children (Lund 2012). According to the study, when Aalto University was established, publications in certain scientific journals deemed of high quality, such as the Financial Times Top 50 journals, became the most important indicator for career advancement (and for remaining in academia). The researchers who were interviewed said the pressure to publish felt unbearable, and one of the interviewees described their anxiety over going to work, where everyone talked about the great efforts that people were putting in to get their articles published in the right journals. Academic leadership was also interviewed for the study, and these interviews confirm that the pressure that the female interviewees felt to continuously publish and to only publish in high-quality journals was not unfounded. Indeed, such a publication profile was an essential consideration in recruitment and tenure track appointments. The study also pointed out that a targeted focus on certain journals favours a specific set of methods, approaches and theories and may stifle the research interest of researchers studying topics for which these methods, approaches and theories are not well suited (Lund, 2012). The study aptly sheds light on why “excessive” teaching can push researchers from the university. Moreover, it describes the problems arising from a focus on academic

excellence. The indicators measuring academic excellence, including lists of journals and impact factors, are always biased in one way or another. The strong emphasis on research excellence first took root at Aalto University, but has since gained wide ground in other universities, as well. The related problems have not gone unnoticed. Nearly all Finnish universities have now signed the San Francisco Declaration on Research Assessment DORA (2021), a set of principles that require assessments to be made on premises that are not solely based on lists of journals and impact factors. More information is required about the practical application of the DORA principles in the recruitment of Finnish universities.

Vehviläinen, Korvajärvi and Ylijoki (2021) analysed the inequality experienced by women in the field of health technology. They interviewed 30 women, all of whom had academic experience at least in the role of doctoral students. As doctoral students, some had experienced dismissive treatment and felt they had received inadequate supervision. As postdoctoral researchers, the interviewees had faced problems especially in obtaining funding and combining family and work. One of the interviewees said a new project based on her dissertation had been fully transferred to others when she took parental leave. However, another interviewee in the same position was able to return to her project, which had been run by a substitute hired for the duration of the interviewee's parental leave. In their later career stages, the women interviewed had experienced inequality in recruiting. According to the study, opaque recruitment processes and tough competition paved the way for unequal operations. (Vehviläinen et al., 2021).

Horizontal segregation is also linked to vertical segregation and inequality in career advancement. Gender segregation sets the foundation for inequality, enabling a hierarchy of professions, meaning that male-dominated professions and work are valued more highly than female-dominated professions and work (Julkunen, 2009, p. 66). In higher education institutions, horizontal segregation means the gender-based differentiation among both students and teaching and research staff in different fields of science and disciplines. Female-dominated fields, like arts and humanities, are also valued less in higher education institutions, leading to, for example fewer resources and lower salaries. Moreover, women still continue to find it more difficult to advance in male-dominated workplaces and fields of science. International research literature has focused especially on women's advancement and the problems they face in the STEM disciplines (science, technology, engineering, mathematics) (Blickenstaff, 2005; Kanny, Sax and Riggers-Pieh, 2014).

Especially in the US, studies have focused on unconscious biases as one of the mechanisms producing inequality. Unconscious – and sometimes conscious – biases refer to preferential or disadvantageous stereotypical views of people or groups. They lead to treatment that is felt to be unfair. Unconscious biases can be held by individuals but also by groups. Unconscious biases based on gender and ethnic background/race have

been studied in academic recruitment, for example in the review of CVs. A study carried out in the field of psychology (Steinpreis, Anders and Ritzke 1999) found that both female and male researchers considered the CVs of men to be better when recruiting early-stage researchers. Similar gender biases were not detected when reviewing the CV of a researcher of very high merit. (Steinpreis, Anders and Ritzke 1999). In other words, it is important to prevent biases especially at the early stages of research careers.

A study focusing on researchers in science revealed that identical applications for a post of laboratory manager were considered better if the reviewer was told they were submitted by a male candidate. Moreover, the reviewers were more eager to mentor an applicant they assumed to be male (Moss-Racusin et al. 2012). In an intersectional study on the evaluation of postdoctoral researchers' CVs in the STEM disciplines (Eaton et al. 2019), the participating physicists rated male applicants higher than female applicants with an identical CV, and the CVs of Asian and white applicants were considered better than those of Black and Latinx applicants. From an intersectional perspective, the CVs of Black and Latinx women were rated as weaker than those of other applicants with an identical CV. However, female applicants were generally considered more agreeable based on the CVs. (Eaton et al. 2020). A French study on the work of committees deciding on academic recruitment offers another interesting perspective. According to the study (Régner et al. 2019), recruiting committees made more gender-biased decisions when the members did not believe there could be a gender bias. The result speaks in favour of providing groups in charge of recruitment with training on the kind of inequality present in research careers and the mechanisms that produce it.

With regard to universities of applied sciences, hardly any Finnish research has been carried out on the segregation and gendered careers of teaching and research staff or the practices creating inequality. Many of the mechanisms that produce inequality in university careers probably do not show up in the same way in universities of applied sciences. The "up or out" approach typical of university careers and the pressure to publish intensively in specific journals of academic excellence apparently does not apply to universities of applied sciences, at least for now (see e.g. Marttila (2015), who describes the career conceptions of teachers of business, marketing and nursing in universities of applied sciences). Nevertheless, universities of applied sciences – just like any other Finnish workplace – probably exhibit some kind of inequality issues. Some indications of this were found in the study concerning universities of applied sciences. The dissertation by Westman (2015), dealing with gender awareness among teachers of universities of applied sciences, describes the impact of gender on the teachers' own work and career advancement. The teachers' narratives collected for the dissertation reveal gender-related shortcomings, inequality and outright discrimination on the one hand, and gender-based privileges, on the other hand. In the narratives, only women recounted experiences of

domineering and dismissive treatment during their career. Dismissive treatment was met especially in male-dominated fields. (Westman, 2015, p. 87).

Research on the inequality of university careers has been criticised for often focusing solely on the narrow career path of the academic elite. For example, the gender scissors and metaphors of leaky career pipelines and glass ceilings, all of which have been used to describe the decreasing number of women when climbing up the career ladder, have long been criticised for only focusing on academic career paths – as if everyone was aiming for a similar career (Stolte-Heiskanen, 1988). The metaphors have also been criticised for offering a static description of the situation and therefore possibly creating an image of women having to change and adapt whereas no changes are needed in the practices of higher education institutions and science (Husu, 2001). From a positive viewpoint, universities of applied sciences can be seen as a higher education environment free from the various mechanisms that produce inequality and hierarchies in academia. Regarding fixed-term employment relationships, according to at least one study (Aarveaara and Pekkola 2010, p. 38), universities of applied sciences did not exhibit the gender disparity found in universities. Instead, women were in permanent employment relationships equally as often as men, and as a rule, permanent employment relationships were more common among respondents from universities of applied sciences than respondents from universities.

International research has also focused on the experiences of teaching and research staff belonging to gender minorities. To date, little Finnish research has been conducted on the experiences of gender minorities in higher education institutions, and the research available focuses on students representing gender minorities (see e.g. Huotari et al., 2011; Lehtonen, 2003, 2013, 2016; Tanhua et al., 2015). For example, the report on gender diversity and ways to account for it in educational institutions, workplaces and authority services (Tanhua et al., 2015) lists good practices, such as: addressing harassment based on gender identity and gender expression; developing teaching and teaching materials to deal with gender diversity (gender is not necessarily dual and can encompass a variety of experiences); addressing pupils, students and staff without assumptions of gender and adjusting the form of address, if required; ensuring the availability of gender-neutral facilities in addition to or instead of gendered facilities (such as toilets); facilitating the procedures for changing entries related to one's name and gender. Some of these practices also support the equality of staff members representing gender minorities.

3 Ethnic equality in the career development of teaching and research staff

In this report, ethnic equality is an umbrella term for a variety of discussions. Some of the research literature uses the concept of ethnicity in general, while others focus on a subfield of it, such as nationality, a foreign background, an immigrant background, language, religion or appearance (skin colour, cultural dress code). In some research literature, the terms racism and racialisation are used. Racialisation means that some groups of people are treated differently because of their skin colour or presumed race/ethnicity. For example, in a higher education work community, a person who “looks foreign” may be recurrently treated as a student instead of a staff member. The concept of microaggression can also be used in such cases. In the literature review, these discussions have been collected in a single chapter under the heading Ethnic equality. Intersectional research, which considers both gender and ethnicity, will also be discussed.

The key findings related to ethnic equality and the career development of teaching and research staff include the following:

- Ethnic scissors clip research careers – in universities, non-Finnish nationals account for 38.5% of doctoral students, but for only 9.4% at the professorial level.
- Compared to Norway and Sweden, Finnish universities have fewer international staff members. At the professorial level, international staff accounted for 10 per cent of staff in Finland, 24 per cent in Sweden and 30 per cent in Norway in 2018.
- Universities of applied sciences have very few non-Finnish nationals – only around 2% – among their teaching and research staff.
- The most significant problems in ethnic equality are related to career advancement and discrimination. Respondents belonging to ethnic minorities experience their opportunities for career advancement as being much worse than ethnic Finns.
- A review of the nature of employment relationships indicates that the work situation of respondents belonging to ethnic minorities is considerably more uncertain than that of the ethnic majority. In addition, disparities in the nature of employment relationships persist throughout the career levels.
- More than one third of respondents from ethnic minorities do not want to or do not believe they can continue an academic career, compared to less

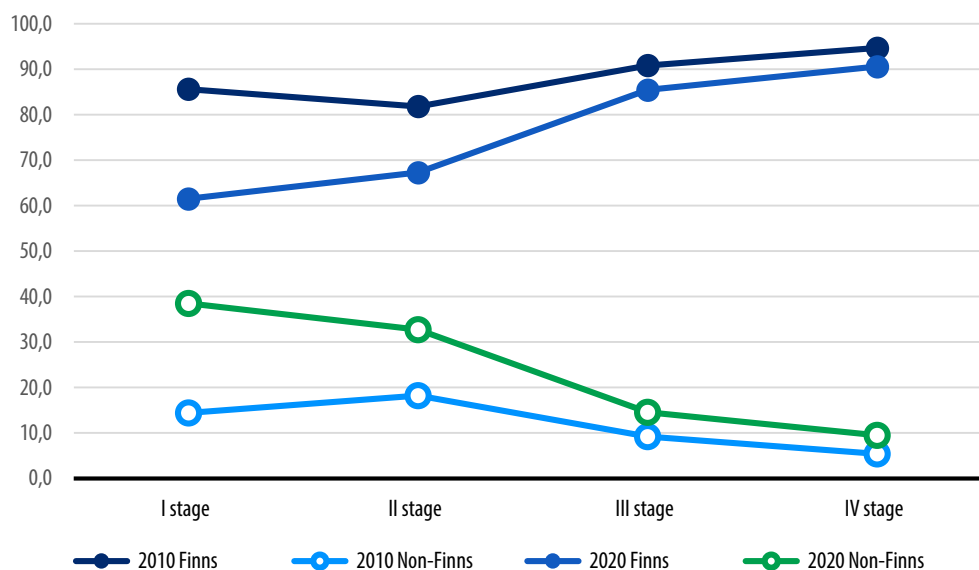
than one quarter of Finnish respondents. Non-Finnish nationals representing ethnic minorities consider their own chances to be very poor.

- Linguistic issues were highlighted when talking about discrimination experiences among ethnic minorities in universities. The lack of proficiency in Finnish was found to both hamper advancement to top duties and exclude people from typical communities.
- Studies based on interviews with migrant scholars portray Finnish higher education institutions as work communities that migrant scholars find difficult to access. Many of the interviewees considered their opportunities at Finnish universities to be very limited.
- Foreign researchers may not have many other career options in Finland.
- Little research has been carried out on the realisation of equality in Finnish higher education institutions, and hardly any on racism and racialisation.

3.1 Ethnic scissors

Statistics can give some indication of the realisation of ethnic equality in universities. Based on a statistical review, not only gender scissors but also ethnic scissors appear to clip research careers. In universities, non-Finnish nationals account for 38.5% of doctoral students, but for only 9.4% at the professorial level.

Figure 2. Proportion of Finnish citizens and other nationalities among academic research and teaching staff at different career levels in 2010 and 2020, percentage of labour units. (Vipunen – Education Statistics Finland: University personnel.)



What underlies the ethnic scissors? The number of non-Finnish nationals among doctoral students has increased steeply in the past decade, but the change has been less notable at other career levels. The situation may level off over time when the non-Finnish researchers now working as doctoral students advance in their academic career. However, this is not necessarily the case. The lack of statistics makes it difficult to monitor the situation: an examination of nationality cannot account for the fact that researchers who have lived in Finland for a longer stretch of time may have obtained Finnish citizenship. Of course, not all international researchers who come to Finland to complete their doctoral thesis seek a career in Finland, or an academic career, for that matter. Nevertheless, we might ask why non-Finnish researchers are recruited for the first level of a research career more so than for the subsequent levels.

Compared to Norway and Sweden, Finnish universities have fewer international staff members (Pietilä et al. 2021). In Finland, non-Finnish nationals accounted for 37 per cent of the staff at the second level of their research careers in 2018, compared to 68 per cent of non-natives in both Sweden and Norway. At the professorial level, international staff accounted for 10 per cent of staff in Finland, 24 per cent in Sweden and 30 per cent in Norway in 2018. (Pietilä et al. 2021).

Overall, universities of applied sciences have very few non-Finnish nationals – only around 2% – among their teaching and research staff. However, it is difficult to say what lies behind these figures and which factors produce inequality, because so little research has been carried out on ethnic equality and its realisation in Finnish higher education institutions, and hardly any on racism and racialisation. A few studies have nevertheless examined the experiences of non-Finnish researchers in Finland and analysed the differences and linkages of internationality, ethnic equality and fairness.

3.2 Unequal career development and ethnic background – what the survey tells us

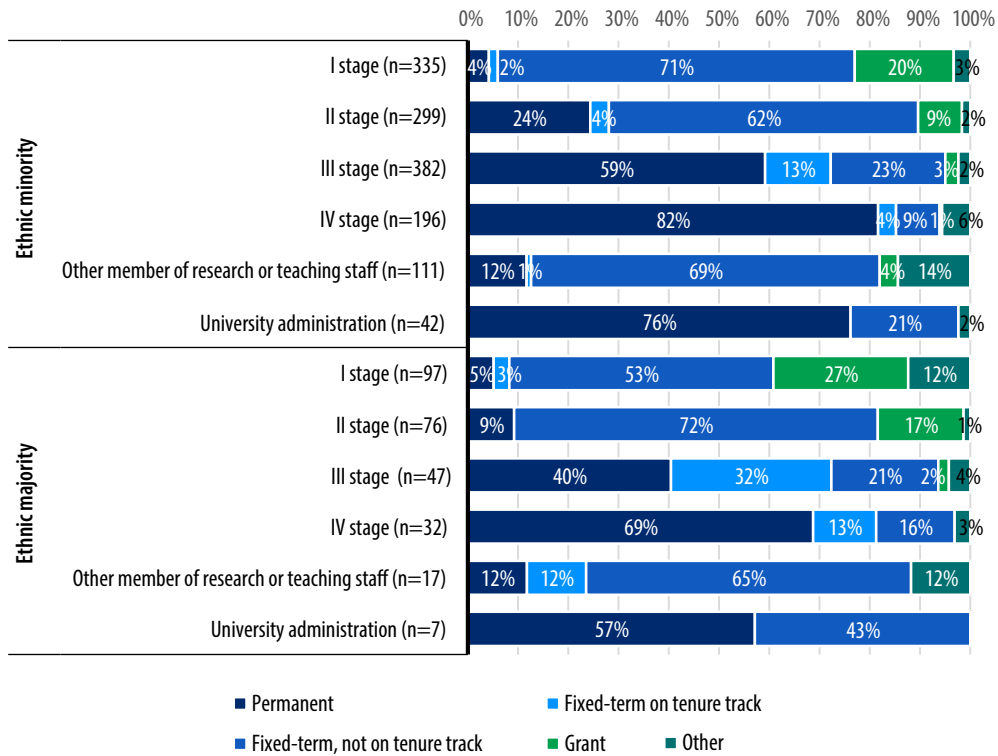
According to the survey, the most significant problems in ethnic equality are related to career advancement and discrimination. Respondents belonging to ethnic minorities want to advance in their academic career but feel that their opportunities to do so are much worse than those of ethnic Finns. This was also highlighted in the open-ended responses, where many representatives of ethnic minorities said they had frequently been sidelined in matters related to career advancement. The results of the questions discussed here are reviewed in greater detail in the separate survey report available on the KOTAMO website at <https://okm.fi/en/project-kotamo>.

A review of the nature of employment relationships indicates that the work situation of respondents belonging to ethnic minorities is considerably more uncertain than that of the ethnic majority. A notably smaller proportion of ethnic minority representatives have a permanent employment relationship and a larger proportion of them work on a grant or in a fixed-term employment relationship without a tenure track position (see Table 8). In universities, a proportionally larger share of ethnic minority representatives work at the lower career levels, but disparities in the nature of employment relationships persist at all career levels. In other words, ethnic minority representatives have more and a greater variety of fixed-term employment relationships and grants, regardless of the career level. One obvious difference is that 12 per cent of the respondents belonging to ethnic minorities, working at the first career level, indicated “something else” as the type of their employment relationship, compared to 3 per cent among those belonging to the ethnic majority (Figure 3). Doctoral students representing ethnic minorities said they funded their doctoral thesis work with their own savings more often than students representing the ethnic majority (see Chapter 4.3.1).

Table 8. Employment relationship based on ethnic background.

	Univ. of appl. sci., ethnic Finns	Univ. of appl. sci., ethnic minorities	University, ethnic Finns	University, ethnic minorities
Permanent	76.5%	62.7%	37.9%	21.4%
Fixed-term, with tenure track	-	-	5.5%	8.7%
Fixed-term, without tenure track	-	-	44.8%	48.9%
Grant	-	-	7.8%	14.5%
Fixed-term	23.2%	35.6%	0.0%	0.0%
Other reason	0.3%	1.7%	3.9%	6.5%

Figure 3. Employment relationship based on ethnic background, by career stage.



The feeling shared by ethnic minority representatives that academic career advancement was more difficult for them than for Finns came up in several questions. More than one third of respondents from ethnic minorities do not want to or do not believe they can continue an academic career, compared to less than one quarter of Finnish respondents (Figure 4). Compared to ethnic Finns, the content of work was less frequently the reason for ethnic minority representatives not wanting to or not being able to continue their academic career. However, in universities of applied sciences, respondents from ethnic minorities were nearly twice as likely as Finns to say they could not continue their academic career even if they wanted to. In universities of applied sciences, ethnic minority representatives listed the work environment and workplace wellbeing as the main reasons for leaving their academic career. In universities, ethnic minority representatives mentioned advancement opportunities as being the main factor more frequently than ethnic Finns.

Figure 4. Continuation of an academic career, by ethnic background (“Do you want to continue your academic career in research or teaching duties?”)

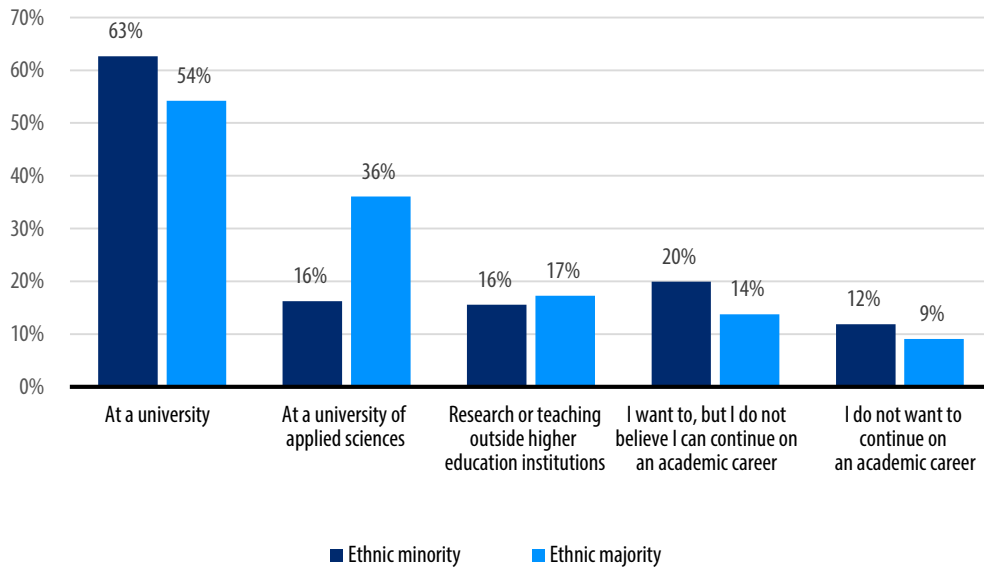


Table 9. The reasons why respondents did not believe they could continue their academic career or did not want to do so, based on gender.

	Univ. of appl. sci., ethnic Finns	Univ. of appl. sci., ethnic minorities	University, ethnic Finns	University, ethnic minorities
n	144	11	365	91
I am not allowed to or cannot perform the duties I want	25%	9%	16%	16%
Career advancement opportunities	28%	27%	42%	51%
Other reason	24%	27%	13%	14%
Level of pay	35%	18%	38%	40%
Family reasons	9%	0%	8%	7%
I did not originally plan to embark on an academic career	26%	0%	19%	16%
Uncertainty of income	13%	18%	48%	42%
Wellbeing at work	24%	55%	34%	27%
Content of work	23%	9%	12%	8%
Demands of work (e.g. publications)	11%	18%	29%	30%
Uncertainty of employment	26%	36%	63%	59%
Working environment	19%	45%	23%	27%

Regarding questions about their career and career advancement, respondents from ethnic minorities considered career advancement to be at least as important as Finnish respondents, and in universities, even more so. This corresponds to the picture formed through interviews and co-creation workshops that people who come to Finland to work at higher education institutions are motivated to continue their academic career, partly because it is difficult for them to find other work on the Finnish labour market.

Ethnic minority representatives and especially non-Finnish nationals find that they are less frequently included in networks, the development of teaching or joint funding applications. However, the most significant difference lies in ethnic minority representatives assessing their opportunities for career advancement being notably weaker than do ethnic Finns, in both universities and universities of applied sciences (see

Table 10). While non-Finnish nationals representing ethnic minorities consider their own advancement opportunities to be very poor, ethnic minority representatives with Finnish citizenship also rated their opportunities lower than respondents from the ethnic majority.

Table 10. Statements about career development, averages of responses based on ethnic background on a scale of 1 = fully disagree ... 5 = fully agree.

	Univ. of appl. sci., ethnic Finns	Univ. of appl. sci., ethnic minorities	University, ethnic Finns	University, ethnic minorities
My roles, responsibilities and work duties match my work experience and competence	4.1	4.0	4.0	4.0
I am satisfied with my career advancement in higher education institutions	3.7	3.6	3.4	3.2
I feel I have the same opportunities to advance in a higher education institution as my colleagues holding similar positions	3.8	3.2	3.5	2.8
I believe career advancement in a higher education institution is important	3.9	3.9	4.1	4.3
I am involved in networks that conduct research and publish together	4.0	3.7	4.1	3.9
I am involved in joint funding applications	3.8	3.5	3.5	3.2
I am involved in the development of teaching	4.3	4.1	3.9	3.7

3.3 Unequal career development and ethnic background – what the interviews tell us

The interviews addressed the question of ethnic (in)equality at higher education institutions in general and the impact on career development. Several interviewees felt that from an international perspective, Finland lags in the promotion of ethnic equality and the topic is not yet fully understood. Existing measures related to gender equality were mentioned much more frequently in the KOTAMO interviews, as well, and the promotion of gender equality was discussed more overall, unless the interviewee had personal experiences of other forms of inequality.

In both individual and group interviews, the issue of language was brought up when discussing ethnic equality and experiences of discrimination in higher education institutions. Under the Universities Act (Chapter 2, section 11) and the Universities of Applied Sciences Act (Chapter 5, section 24), Finnish and Swedish are the languages of instruction and degrees in higher education institutions, but the institutions can nevertheless also use other languages in their operations and daily activities. The lack of proficiency in Finnish was found to both hamper advancement to top duties and exclude people from typical communities. For example, a researcher who did not speak Finnish had not been invited to a meeting where everyone else spoke Finnish because it was “easier for everyone”. Several interviewees suspected that because of their non-Finnish background they had a lower position or a less advantageous contract than an ethnic Finnish colleague in an equivalent situation or that they had not been selected for a position without their really knowing why.

The impacts of linguistic practices in higher education institutions on career advancement were described in many interviews. One of the interviewees, who did not speak Finnish, characterised the Finnish language as a glass ceiling: although it takes years to learn Finnish, the interviewee said there was no alternative if you wanted to advance in your academic career in Finland. Meanwhile, many of the interviewees felt they were not supported in learning Finnish, for example by allocating some of their working hours for the task. A few interviewees pointed out that candidates who did not speak Finnish felt they were at a disadvantage in recruitment if another candidate spoke Finnish and could therefore give bachelor’s level courses in Finnish, for example (see also Chapter 4.4). According to one of the interviewees from a university of applied sciences – who did not speak Finnish – questions about their Finnish language skills had been asked at the recruiting interview, even though Finnish language skills were not a requirement in the job announcement. Similar experiences were found in universities where Swedish was the language of teaching and administration: in this case, applicants who are not proficient in Swedish find it difficult to succeed. According to one of the interviewees, Swedish is considered a merit even if it is not mentioned in the official recruiting criteria.

Several of the interviewees who did not speak Finnish said they had experienced discrimination in everyday informal contexts in the work community. Even in workplaces where the language of work is English, unofficial discussions are carried out in Finnish, which adds to the feeling of being an outsider. One of the interviewees said they were not invited to an after-work event, presumably because the interviewee does not use alcohol. Commenting on the gravity of discrimination, another interviewee remarked that “small things accumulate and finally break the camel’s back”.

The interviews made it clear that Finnish culture at large influences the experience of equality in both universities and universities of applied sciences. That is why higher education institutions should emphasise cultural understanding and cross-cultural interaction. The respondents found Finnish culture to be challenging, and several interviewees said they had first experienced Finns as being unfriendly. According to them, a solid introduction into the Finnish culture would help make many foreigners feel more welcome. However, the interviews also revealed that universities have made a great deal of progress in their induction practices and the inclusion of non-ethnic Finns in the past decade.

In the interviews concerning universities of applied sciences, many of the interviewees said that while universities of applied sciences strive to be international, they do not yet put enough effort into internationalisation and functioning, diverse work communities. Some of the staff interviewed at universities of applied sciences also suspected that they had not been selected for job interviews despite having suitable competence and experience because they were not Finns and did not speak Finnish. As for applications for research funding, one of the non-Finnish respondents said that they had not been invited to join groups seeking funding and had not even heard about the plans to apply for funding in time, despite having just the right experience for the task. According to the interviewee, a small group of Finnish men consider themselves gatekeepers, “holding on to projects” and not taking others on board. One of the interviewees said that racism is still found in universities of applied sciences, which can be seen in the reluctance to work with non-Finns and in racist comments.

In two of the interviews, the interviewees noted that there are differences among Finnish higher education institutions in how normal ethnic diversity and the promotion of ethnic equality is in their daily operations. According to a representative of a university operating outside the metropolitan area, the staff and leadership of their university had limited experience of multicultural work environments, which might be a reason for these themes receiving less attention and not being promoted in leadership and recruiting, for example. The small number of international teaching staff seen in statistics was also reflected in the interviews: overall, hardly any challenges related to the promotion of ethnic equality came up in interviews with Finnish-speaking interviewees. Instead, a foreign national

working at a university of applied sciences, who did not speak Finnish, was generally of the opinion that their institution was not yet open to diversity, which could be seen in nearly all communication taking place in Finnish. Weekly meetings, for example, were held in Finnish although decisions affecting the entire work community were made there.

A key challenge in the promotion of ethnic and gender equality is that representatives of ethnic and linguistic minorities do not necessarily have great confidence in their institutions' process for addressing harassment and other problems. The survey results also point to this. An interviewee who represented an ethnic and linguistic minority, who had experienced discrimination and workplace harassment, said that although there are processes for dealing with harassment, people do not necessarily trust their effectiveness. According to this interviewee, reporting harassment was more likely to weaken their chances of advancing in their career than lead to concrete action. "At the university, you can send a complaint to the Chancellor of Justice, but any consequences are minor," said another interviewee, commenting on the reporting of discrimination cases.

3.4 Reasons for inequality in career development according to research literature

Strikingly little research has been conducted on ethnic equality in Finnish higher education institutions. Studies based on interviews with migrant scholars portray Finnish higher education institutions as work communities that migrant scholars find difficult to access (Hoffman, 2007). The 42 scholars interviewed had moved to Finland from 27 different countries, and at the time of the interview, 14 of them had a permanent employment contract, 22 a fixed-term contract, and six were master's level students who were transitioning to the postgraduate stage. Many of the interviewees considered their opportunities at Finnish universities to be very limited, and some of them left Finland while the study was underway. In some fields, researchers also said that a very narrow view was taken on the research topics suitable to them. For example, they were not believed capable of studying Finland but were expected to research a phenomenon in their home country or the experiences of "their own immigrant group" in Finland. (Hoffman, 2007).

Studies also indicate that foreign researchers may have very few other career options in Finland. The lack of alternatives may force them to continue their battle in an increasingly competitive academic environment (Peura and Jauhiainen, 2018), sometimes at the expense of their own coping (Pappa, Elomaa, and Perälä-Littunen, 2020). A study on international doctoral students in the field of educational sciences (Pappa et al., 2020) focused on the stress experienced by doctoral students. According to it, international

doctoral students who moved to Finland experienced their doctoral studies to be very stressful, although some of them considered stress to also be a positive force. However, the results also revealed serious psychosomatic symptoms and loneliness. The doctoral students interviewed for the study felt anxious about applying for funding and were distressed by the knowledge that academic staff have to fight for funding and career opportunities at later stages of their career, as well.

Another study focusing on doctoral students (Peura and Jauhiainen, 2018) examined how Finnish and non-Finnish students in doctoral programmes in arts and humanities, social sciences and educational sciences viewed doctoral studies. The interviewees included six non-Finnish and six Finnish doctoral students, all of whom had at least two years of experience of doctoral studies. The doctoral students were categorised into three groups: academic career seeker, vacillator under competitive strain and independent learner. All the vacillators under the strain of competition were Finns, which the authors took to reflect the fact that Finnish doctoral students also have other career options in Finland. Academic career seekers included five non-Finnish and one Finnish scholar. For them, an academic career was largely self-evident. However, this group also considered their own opportunities to be limited and academic competition to be tough. The uncertainty of the future was further accentuated in the doctoral students' descriptions of how the continuous application for funding takes time from research work. One of the interviewed non-Finns considered Finns to have an advantage in terms of funding applications. (Peura and Jauhiainen, 2018). This study also sheds further light on the reasons for the stress experienced by non-Finnish doctoral students, described in Pappa et al., 2020. While international researchers may face numerous problems, they are nevertheless committed to an academic degree partly because the range of career opportunities available to them is more limited in Finland.

Hardly any Finnish research has been conducted on the ethnic equality of teaching and research staff in universities of applied sciences. Some material is available on migrant students of universities of applied sciences. For example, Lätti, Timonen and Toivanen-Sevrjukova (2012) describe the everyday life of migrant students and analyse the degree to which they have been included in their higher education community. A thesis surveying the development of anti-racist work in the degree programme for civic and youth work (Malila, 2011) found that topics related to racism and anti-racist efforts are not adequately discussed at the moment.

4 Gender and ethnic equality in recruitment at different career stages

In higher education, teaching and research careers are offered by universities and universities of applied sciences. Research careers can also be pursued in research institutes, elsewhere in the public sector or in business and industry.

Finland has 14 universities. Universities offer four-stage teaching and research careers (adapted from Välimaa et al., 2016; Ministry of Education, 2006).

- I. Junior researcher, often a doctoral student or project researcher
- II. Postdoc/project researcher (doctorate)/university teacher
- III. Assistant professor (with or without tenure track)/university lecturer
- IV. Professor/research director

Finland has 24 universities of applied sciences. In universities of applied sciences, teaching and research duties include those of lecturer of university of applied sciences, principal lecturer, project researcher and teacher of university of applied sciences. In addition, universities of applied sciences offer the duties of, for example research directors, heads of competence areas and project managers. While the careers of teaching and research staff in universities of applied sciences are not perceived as being as hierarchical as in universities, the report by the Ministry of Education and Culture (2016) nevertheless uses the four stages mentioned above also for the staff of universities of applied sciences. According to the report, researchers, lecturers and hourly-paid teachers are on I stage, while principal lecturers, research managers and project managers are on III stage. IV stage is for research directors and heads of competence areas.

The key findings related to gender and ethnic equality in recruitment include the following:

- Less research is available about the recruitment of doctoral students and postdoctoral researchers than about later career stages.
- The recruitment criteria for doctoral students have become stricter and have shifted in favour of younger students who have recently gained their master's degree and are thus more adaptable to school-like doctoral studies (Forsberg, Kuronen and Ritala-Koskinen, 2019).

- Recruiting for project researchers and externally funded positions is often informal and based on existing networks instead of open job announcements (Siekkinen, Pekkola and Kivistö 2016).
- In 2019, women accounted for more than half (57.3%) of the applicants for permanent professorial positions, but for significantly less than half (35.3%) of those selected (Pekkola et al. 2020).
- Men are favoured especially when professorships are filled through an invitation procedure (Pekkola et al. 2020).
- The proportion of non-Finnish nationals was by and large greater among applicants than those selected. For example, in tenure track positions, non-Finnish nationals accounted for 56.6% of the applicants but only 32.7% of those selected for the positions (Pekkola et al. 2020).
- Citizens of countries other than Finland account for a notably smaller proportion of applicants to universities of applied sciences than to universities.
- Men and ethnic Finns were involved in recruitment decisions more often than women and ethnic minority representatives.
- Women considered increasing the diversity of staff to be a considerably more important recruitment criterion than men.
- Respondents from ethnic minorities found the processes to be opaque and had observed favouritism and outright discrimination more frequently than ethnic Finns in both universities of applied sciences and universities.
- Compared to men, women did not experience the recruitment practices of higher education institutions to be as consistent and rated them clearly less supportive of gender equality, non-discrimination and diversity.
- According to interviews, gender equality and non-discrimination are addressed very selectively. For example, attention may be placed on the terminology used in a job announcement instead of addressing the topics holistically throughout the process when making recruitment decisions.
- According to interviews, the applicants' multi- and interdisciplinarity are not valued enough in recruitment.

4.1 Research on practices creating inequality in university recruitment

Recruitment statistics and international research on recruiting indicate that the recruitment processes at different career stages and for different positions may differ widely and may be influenced by gender and nationality in various ways. Regarding the selection of doctoral students, professors and research group leaders typically have a great deal of power to influence who are recruited as doctoral students into their

unit (Siekkinen, Pekkola and Kivistö, 2016). Research literature has focused less on the recruitment of doctoral students than on recruitment at later career stages, such as for the positions of professor or assistant professor. However, some research is available. For example, a Finnish study (Forsberg, Kuronen and Ritala-Koskinen, 2019) describes the opinions of professors of social work concerning the recruitment of doctoral students. According to the study, the recruitment criteria have become stricter and have shifted in favour of younger students who have recently gained their master's degree and are thus more adaptable to school-like doctoral studies. Some of the professors considered practical social work to be important and therefore criticised the trend favouring doctoral studies right after the master's degree. One example of international research is the recently published study on Koreans seeking information to apply for doctoral student positions in the UK (Kyung and Spencer-Oatey, 2021). The study brought up many questions related to the recruitment process. For example, the applicants found it difficult to identify potential supervisors for their doctoral thesis or know how to approach them appropriately (Kyung and Spencer-Oatey, 2021). Since Finland is one of the countries competing for internationally mobile doctoral students, it could be useful to know what they think about the recruitment processes of Finnish higher education institutions.

Studies focusing on the early stages of research careers often examine the postdoctoral stage, for example, the first one to seven years after the doctoral thesis defence (Signoret et al. 2019). Parties granting postdoctoral funding also influence this period. Research literature has not focused on the recruitment of postdoctoral researchers to the same degree as the later-stage recruitment of, for example, professors or tenure-track assistant professors. (Herschberg, Benschop and van den Brink 2018a). However, some research has been carried out, and internationally speaking, studies on the early stages of an academic career are numerous. According to a Finnish study (Siekkinen, Pekkola and Kivistö 2016), especially the recruitment for project researchers and externally funded positions differs from that in other academic positions. Typically, recruitment for these positions is informal and based on existing networks instead of open job announcements.

The recruitment of assistant professors and professors has been studied by, for example, Pekkola, Siekkinen, Kujala and Kanninen (2020). They carried out a comprehensive examination of the recruitment of professors in Finnish universities and research institutes over one year in 2019. According to the study, women accounted for 57.3% of the applicants for permanent professorial positions, but for only 35.3% of those selected. Proportionally fewer women are selected for the tenure track and when the appointment of professors is based on the invitation procedure. Of those selected through an invitation procedure, 71.4% were men. In other words, the proportion of women selected through an invitation procedure was smaller than the proportion of women among professors. The proportion of non-Finnish nationals was by and large greater among applicants than those selected. For example, in tenure track positions, non-Finnish nationals accounted

for 56.6% of the applicants but only 32.7% of those selected for the positions. According to the questionnaire included in the study (Pekkola et al., 2020) sent to academic leadership (rectors, vice rectors and deans), the assessment of academic potential has gained importance and takes place at an increasingly early career stage, not just before the appointment as professor. Nevertheless, potential continues to be assessed mainly based on traditional statements, relying on prior merit.

4.2 Practices creating inequality in recruitment in universities of applied sciences

Table 11 depicts the numbers of applicants and selected candidates for teaching and research duties in universities of applied sciences in 2020, first by nationality and then by nationality and gender. Of the total of 5,421 applicants, 433 were selected. Men accounted for 31.6% of the applicants and 34.2% of those selected in 2020. Finnish nationals accounted for 93.8% of the applicants and 85.2% of those selected. The number of foreign nationals was very small among both the applicants and the selected candidates. Of the selected 433, eight were non-Finnish nationals. In other words, citizens of countries other than Finland account for a notably smaller proportion of applicants to universities of applied sciences than of applicants to universities. Of the non-Finnish applicants, men accounted for 67.8% and women for 29.1%. Of those selected from among non-Finnish applicants, women accounted for 40%.

Table 11. Applicants and selected candidates in the staff recruitment of universities of applied sciences by nationality and gender in 2020, per cent of applicants and selected candidates. (Vipunen – Education Statistics Finland: Staff recruitment in higher education institutions.)

	Men and women, total		Men		Women	
	Applicants	Selected	Applicants	Selected	Applicants	Selected
Nationalities, total	100	100	31.6	34.2	68.1	57.0
Finland	93.8	85.2	29.3	37.9	70.6	62.1
Europe (excl. Finland)	2.4	0.7	66.7	100.0	33.3	0.0
Other	3.7	1.2	67.8	60.0	29.1	40.0
Data on nationality missing	0.1	12.9				

At least the searches conducted for this report did not find Finnish research on recruitment in universities of applied sciences. It would be important to study recruitment in universities of applied sciences from the perspective of gender and ethnic equality. Studies focusing on RDI staff would be particularly interesting.

4.3 Recruitment, gender and ethnicity in higher education institutions – what the survey tells us

The survey also examined the recruitment experiences of teaching and research staff in higher education institutions. Respondents who had participated in recruitment were asked to assess the recruiting processes they had been involved in. Respondents who did not have experience of recruitment were presented with four statements about recruitment at their own higher education institution. Overall, those who had participated in recruitment considered the processes quite transparent and found that the selections had been based on the criteria indicated. Some tailoring to favour a specific applicant had been detected, but outright discrimination based on the applicant's ethnic background or gender was relatively rare.²

However, there were notable differences in the experiences of different groups of respondents. Men and ethnic Finns were involved in recruitment decisions more often than women and ethnic minority representatives. This is partly due to the fact that respondents at higher career levels have participated in recruitment considerably more often than those at the lower levels and that the number of respondents at higher career levels is proportionally larger among men and ethnic Finns.

Table 12. Respondents involved in recruitment, per cent.

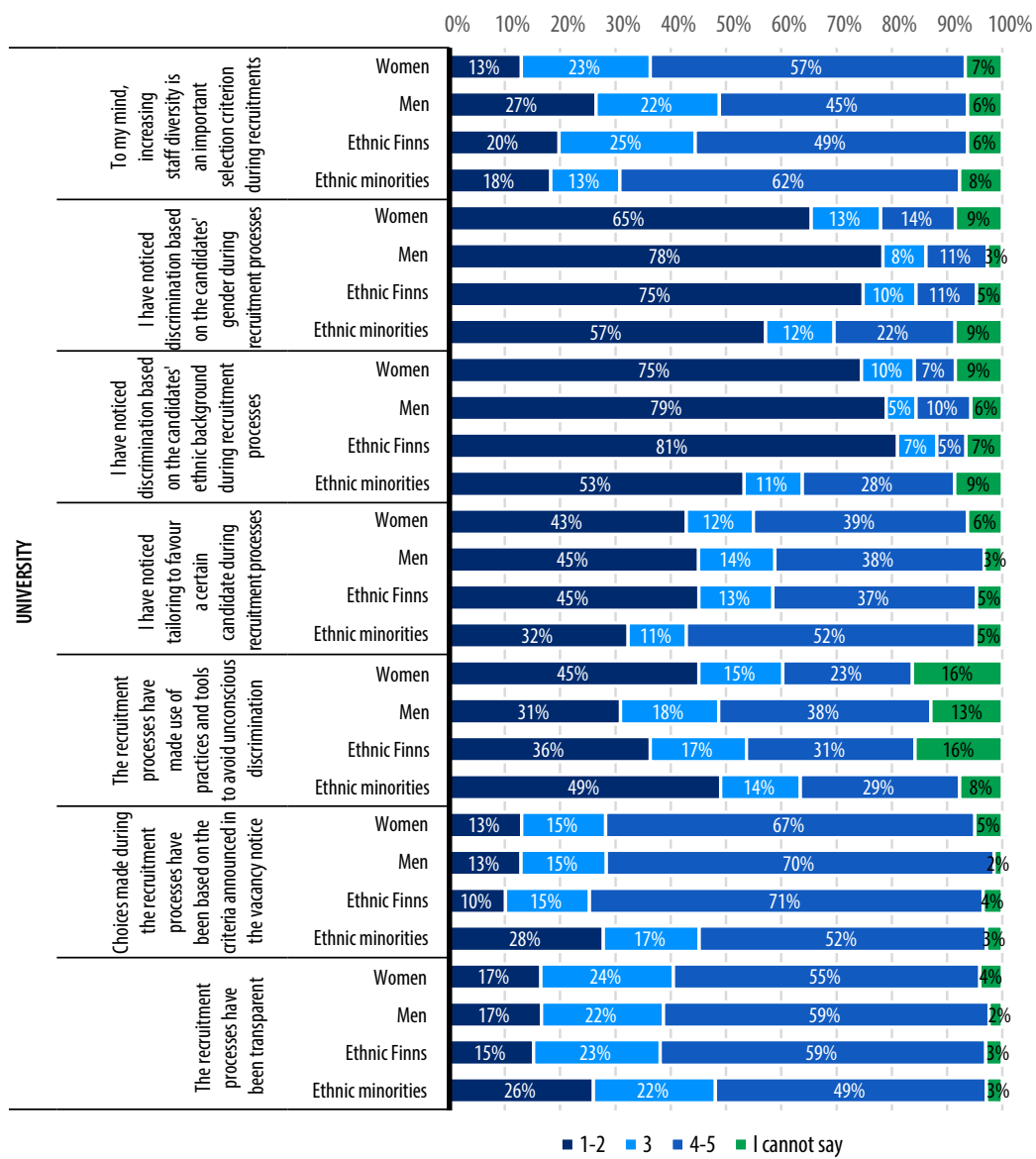
	Men	Women	Ethnic Finns	Ethnic minorities
Universities of applied sciences	41.10%	31.50%	34.20%	28.80%
Universities	51.30%	39.30%	45.10%	39.40%

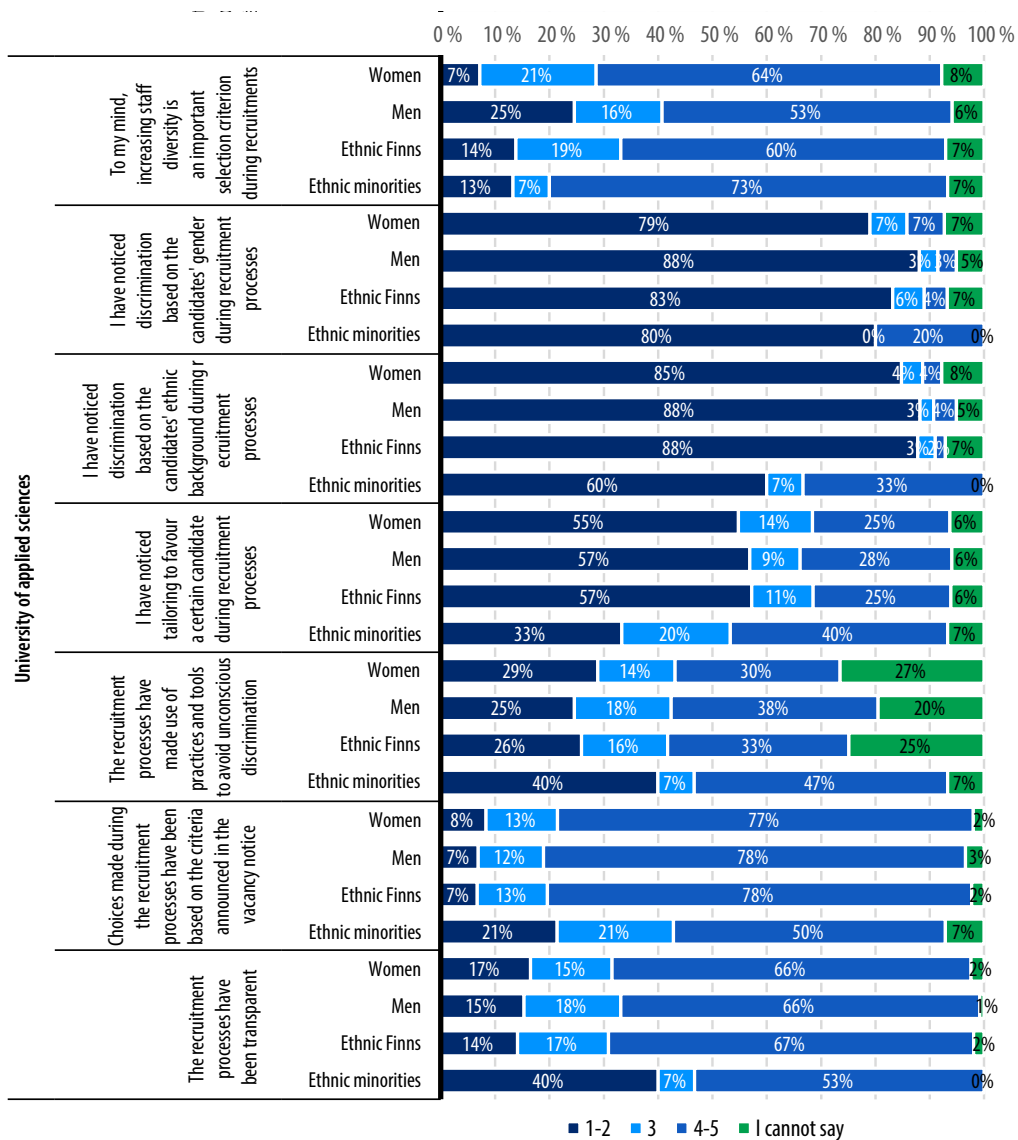
² The results of the questions discussed here are reviewed in greater detail in the separate survey report in Chapter 5. The report is available on the KOTAMO website at <https://okm.fi/kotamo>.

The main difference among female and male respondents who had taken part in recruitment was that for women, increasing the diversity of staff was a considerably more important recruitment criterion than for men. Women also found that tools for avoiding unconscious bias were not used as much as men thought. Moreover, women in both universities of applied sciences and universities had detected gender-based discrimination more frequently (see Figure 6). The differences between ethnic groups were even more significant. Respondents from ethnic minorities who had participated in recruitment found the processes to be opaque and had observed favouritism and outright discrimination, especially based on ethnic background, more frequently than ethnic Finns in both universities of applied sciences and universities (see Figure 5). Analysed by career level, respondents at a higher level tended more frequently to consider the recruitment processes transparent and non-discriminating. This difference was particularly distinguishable in universities of applied

sciences, where respondents in a leading position experienced recruitment processes on the whole to be more equal and better functioning than respondents belonging to staff.

Figure 5. Assessment of teaching and research staff recruitment, where the respondent has been part of the decision-making. Distribution of responses by gender and ethnic background on a scale of 1 = fully disagree ... 5 = fully agree.



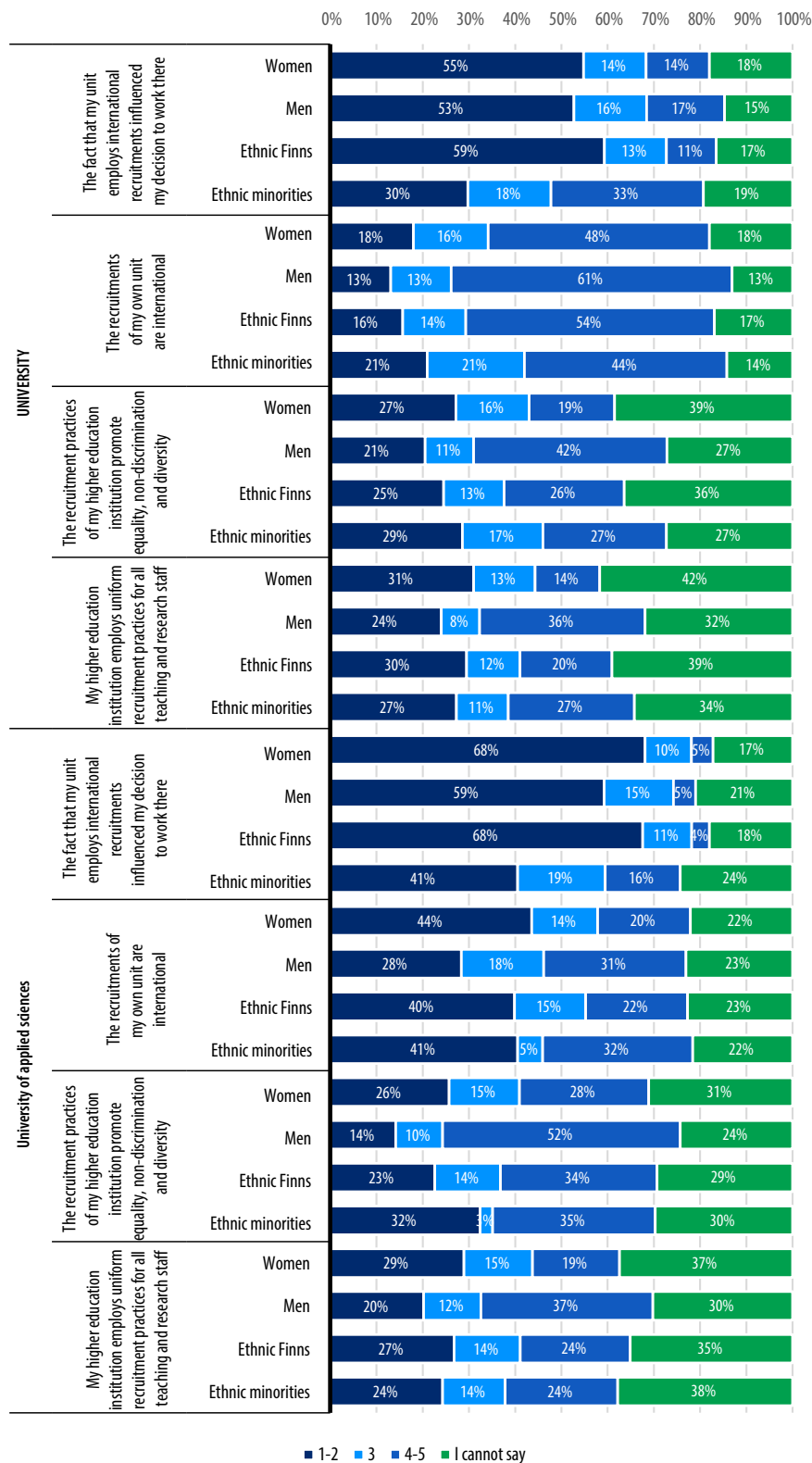


Marked gender differences were observed for respondents who had not participated in recruitment decisions but assessed the recruitment of their higher education institution in general. Compared to men, women did not experience the recruiting practices of higher education institutions to be as consistent and rated them clearly less supportive of gender equality, non-discrimination and diversity. No differences were detected between ethnic groups in the responses to general statements about recruitment processes in higher education institutions. The internationality of recruitment was the only aspect that was, on average, a clearly more significant reason for respondents from ethnic minorities to apply for a position in their present unit. For ethnic Finnish respondents, internationality had little significance, especially in universities of applied sciences (Figure 6).

The general statements concerning the recruitment processes of higher education institutions did not show the same kind of differences by career level that were detected in the assessment of recruitment processes in which the respondent was personally involved. Respondents at the higher career levels assessed these statements in much the same way as other respondents, especially in terms of the average of responses. However, an analysis of the distribution of responses indicates a notable difference in the “no opinion” responses, which were significantly more frequent among respondents at lower career levels. Their proportion at the lower career levels in both universities of applied sciences and universities was more than twice that recorded for higher career levels, especially concerning the consistency and equality of recruitment processes.

What was conspicuous was the large variation in responses and the large proportion of “no opinion” responses. One third of the respondents could not evaluate the consistency or equality of recruitment in their higher education institution. This was also noted in the open-ended responses. Many of the respondents who had not personally participated in making recruitment decisions said it was impossible to assess the processes from the perspective of an applicant or outsider based on the data available. This indicates that the recruitment processes of higher education institutions are not very clear and transparent to members of the teaching and research staff who do not make the recruitment decisions.

Figure 6. General assessment of the recruitment processes of higher education institutions, responses by gender and ethnic background on a scale of 1 = fully disagree ... 5 = fully agree.



4.3.1 Doctoral students

The survey included a separate section for doctoral students. In earlier literature, the recruitment of doctoral students, their career advancement and funding of doctoral studies have been indicated as areas where universities have fewer formal operating methods, and which thus present more chances for various types of discriminating and unequal treatment. The open-ended responses often highlighted situations in which the opinions, approaches or conceptions of doctoral students and their supervisor did not meet. However, what was of greatest interest in the survey was whether any systematic differences in the experiences of doctoral students could be detected between different groups.³

In the survey, doctoral students were asked how they had funded their doctoral research and what they considered to have been their main type of funding. The employment relationship, indicated by 47 per cent of the respondents, was found to be the most important funding type. While there were differences in the proportions of employment relationships in different fields of science, it was nevertheless the main type of funding in all fields but arts and humanities, where personal grants played a greater role. In the field of medicine and health sciences, grants received as part of a project or research group were more important than in other fields.

No considerable differences between women and men were detected in types of funding. For men, an employment relationship was slightly more common and for women, a personal grant, but these findings can be largely explained by the differences in funding in male- and female-dominated fields of science. Respondents from ethnic minorities had used their own savings or equivalent sources slightly more frequently to fund their doctoral studies. This was the main type of funding for 16 per cent of ethnic minority respondents, compared to 9 per cent among ethnic Finnish respondents. Ethnic minority representatives also received grants more often as part of a research group, while ethnic Finns used personal grants. Nevertheless, a doctoral employment relationship was the main type of funding for all ethnic groups.

In statements concerning the doctoral thesis, respondents were asked about their experiences of recruitment, supervision, treatment, funding and thesis progress. Only minor gender differences were noted, but all of them were largely similar. On average, men were less concerned about the progress of their doctoral thesis, and they considered the recruitment process clearer, the supervision they received better and the treatment

3 The results of the questions discussed here are reviewed in greater detail in the separate survey report in Appendix 2, Chapter 6. The report is available on the KOTAMO website at <https://okm.fi/kotamo>.

of doctoral students better than women respondents. There were some differences between ethnic groups, but they, too, were mainly small. On average, respondents from ethnic minorities were slightly more concerned about the funding and completion of their doctoral thesis, but in general more satisfied with the treatment they and other doctoral students had received at the department. However, the most significant difference was noted in the views about their post-doctorate future, which caused considerably more concern among ethnic minority representatives (see Table 13). This indicates that respondents from ethnic minorities, and especially non-Finnish nationals, are concerned about difficulties related to their career advancement the same way they are about many other questions. Based on the open-ended responses and previous research, non-Finnish doctoral students often worry especially about matters related to their residence permit at the time of graduation.

There was a large spread in the responses to several statements nevertheless. The fewest responses were received midway on the scale. According to the survey, a significant proportion of doctoral students are very worried about obtaining funding to finalise their doctoral research (30 per cent of the respondents marked a 5 for this statement). On the other hand, some are not at all worried about funding (24 per cent marked a 1 for this statement). The rest fall between these two options, and only nine per cent of all the respondents marked a 3 for this statement. This division was also noted in the open-ended responses, where many respondents brought up their stress and concern about being able to complete their doctoral thesis and doctoral studies.

Table 13. Statements concerning the doctoral thesis, averages of responses based on gender and ethnic background on a scale of 1 = fully disagree ... 5 = fully agree.

	men	women	ethnic Finns	ethnic minorities
n	144	310	377	81
I am concerned about funding for completing my doctoral thesis	2.9	3.2	3.0	3.4
The process for recruiting doctoral students is clear and I understand the relevant criteria	3.3	3.1	3.1	3.3
I am satisfied with the supervision I have received for my doctoral thesis	3.5	3.5	3.5	3.7
I feel that doctoral students are appreciated and treated well at my department	3.6	3.3	3.4	3.5
I am concerned about the progress of my doctoral thesis	3.2	3.3	3.2	3.4
I am concerned, worried or anxious about my future after the doctorate	3.2	3.4	3.2	3.7

4.4 Recruitment – what the individual interviews tell us

The individual interviews dealt with the interviewees' personal experiences as candidates and as recruiters, if they had experience of the latter. The interviewees provided examples of recruiting processes that had proceeded as expected, as well as of processes that they had experienced as being unfair or problematic overall. This chapter examines key observations of recruitment processes from the perspective of ethnic and gender equality.

The content of job announcements published by higher education institutions was considered to have improved in recent years. For example, efforts have been made to avoid masculine language and to use gender-neutral concepts in the announcements. People from different backgrounds are encouraged to apply for positions. One of the interviewees involved in making recruitment decisions said their higher education institution emphasises themes such as nature, family friendliness and safety in their job announcements. These are felt to be important incentives for younger applicants pursuing an academic career to apply for the position. Some of the interviewees pointed

out that the application text alone cannot improve equality and diversity in the higher education community if the application is not actively distributed in networks including underrepresented groups.

The interviewees' experiences differed in terms of how well they understood the progress of the recruitment process and the related decision-making and how the decisions were justified. They gave examples of processes in which the applicant had been supplied with a schedule of the recruitment process. This was considered a good way to keep the applicant up to date on the process. However, two of the interviewees described their own recruitment process as a "black hole", referring to the inadequate communication about schedules and justifications. One tenure track applicant said it remained unclear why they had not been selected. One of the interviewees, who had served as a member of recruitment committees, remarked that the recruitment process may also seem "mysterious" to the committee members. According to this interviewee, despite being involved in time-consuming committee work, the members do not always know how much their work influenced the final decision. This weakens the motivation of members.

Several interviewees also commented more extensively on the operating methods and compositions of recruitment committees. Since the recruitment working groups make recruitment-related proposals, their composition was considered to play an important role in the recruitment decision. According to the interviewees, more emphasis should be put on training the working groups and ensuring their familiarity with each recruitment process so that the relevant things would be taken into account in each process. The male dominance of recruitment working groups was mentioned in several of the interviews. A female interviewee said she had participated in many male-dominated recruitment working groups and had often had to take the role of a "diversity officer" in the group's activities. However, she felt that diversity and related topics are now discussed more than before, but that work is still required to include the themes in difficult decisions and discussions about who is competent for a specific position.

Recruitment working groups were also considered to have strengths in terms of gender equality and non-discrimination – instead of only one individual, such as the director of the research group, making recruitment decisions largely on their own, with the administrative support of HR. The involvement of groups was believed to prevent the selection being based on a single individual's potentially biased opinion of what a good candidate is like.

Generally speaking, the interviewees said they had participated in recruitment processes that they had experienced as unfair. For example, one of the interviewees had been asked about their Finnish language proficiency, even though language skills had not been a requirement in the recruitment criteria. According to another interviewee, the criteria that

the selection is generally based on and how language proficiency ultimately influences the selection can sometimes be unclear. However, the same interviewee remarked that the unclarity of criteria is not only a question concerning ethnic equality but is generally a challenge in academic careers.

Much of the recruitment in higher education institutions takes place in research projects. In this case, no open recruitment is necessarily organised, and recruitment is instead coordinated by the head of the research project. A few interviewees said this was the way they secured their first job at the university, for example, by being hired by their doctoral thesis supervisor for the supervisor's own research project. One of the interviewees said the author of the research project application was sometimes recruited directly for the project. This type of recruitment was described as being cost-efficient and simplifying things, but it was also found to carry risks for gender equality and non-discrimination in the recruitment process. "It's an unregulated field," said one of the interviewees.

Regarding universities of applied sciences, the succession of fixed-term employment contracts was identified as an element eroding equality in recruitment, as this means not converting the employment relationship into a permanent one. As indicated by the statistics, the teaching staff of universities of applied sciences is predominantly female, but according to one interviewee, the difference has levelled out.

Interviewees representing universities considered various explanations for the statistics on university staff recruitment indicating that in 2020, non-Finnish nationals accounted for 78.9 per cent of the applicants and for 21.7 per cent of the selected candidates (source: Vipunen – Education Statistics Finland). Comments about language and an academic career pursued outside Finland were mentioned in particular. Language skills were thought to be one reason: recruiters may believe that applicants without Finnish language skills will have trouble finding employment in fields other than engineering and that the administrative work in higher education institutions would be delegated to staff speaking Finnish. Moreover, non-Finnish applicants were thought to seek positions in Finnish higher education institutions for which their competence may not be ideally suited. Finnish higher education institutions were also suspected of being more prejudiced towards degrees completed in other countries, especially outside the EU, and the competence base they provided: "People trust the things they know, which in this case is Finnish institutions", said one of the interviewees. Another explanation mentioned in the interviews was the concern about the length of time that a candidate hired from abroad would remain in Finland.

Two of the interviewees mentioned their experiences of the applicant's multi- and interdisciplinarity not being appreciated in recruiting. One of the interviewees felt that interdisciplinarity was not appreciated in recruitment or that it might have even

been considered a weakness in the assessments. According to another interviewee, multidisciplinary has proved to be a challenge for universities because they usually offer permanent academic positions based on the person's deep knowledge in their own discipline.

5 Experiences of equality and non-discrimination in the work community

The survey sought to determine the respondents' experiences of discrimination over the past two years, as well as the diversity of research groups. The Non-Discrimination Ombudsman's definition of discrimination was applied in the introductory text of the questionnaire.⁴

The key findings concerning experiences of equality and non-discrimination in the work community were the following:

- On the whole, experiences of discrimination are quite common in higher education institutions.
- Women in both universities of applied sciences and universities reported having experienced discrimination slightly more often than men.
- Nearly half of the ethnic minority respondents in both universities and universities of applied sciences reported having experienced discrimination. This is nearly twice that reported for ethnic Finnish respondents.
- The gender differences and differences between ethnic groups were nearly the same size regardless of the field of science.
- According to the survey, reporting and addressing discrimination is still rather uncommon in higher education institutions. Moreover, reporting discrimination rarely resulted in any action.
- The survey respondents had met with more discrimination, insults and threats within their higher education community than outside it.
- According to the statements, the groups that were more vulnerable according to the survey often experienced their work community as less equal and thus their own opportunities to participate in the community's activities and networking as less favourable.

4 In the questionnaire, discrimination was divided into "direct discrimination, which means being treated less favourably than another person would be treated in a comparable situation due to a personal characteristic" and in "indirect discrimination, meaning that an apparently neutral provision, criterion or practice puts a person at a disadvantage compared with other persons based on a personal characteristic" (for more details, see Appendix 2).

- Research group directors found the work atmosphere and equality of their research group to be better than the members of the group. Overall, the work atmosphere of research groups was considered to be good.
- Of the men, a larger proportion of the respondents working outside groups did not want to be part of a research group, neither in universities nor universities of applied sciences.
- Respondents from ethnic minorities wanted to be part of a research group more often than ethnic Finnish respondents, both in universities and universities of applied sciences.
- The reasons given by university respondents for being left out of research groups included the lack of networks, the research topic and the established practices in the field of science. Respondents from universities of applied sciences mentioned the lack of academic merit more frequently as the reason. Discrimination based on non-professional characteristics was even more prominent among respondents from ethnic minorities compared to ethnic Finnish respondents.
- Women worked more often in predominantly female research groups and men in predominantly male research groups. This difference can be explained by the horizontal gender segregation between fields of science.
- In universities, men and ethnic Finnish respondents were proportionally more frequently directors of research groups than women and ethnic minorities. In universities of applied sciences, the differences between respondent groups were insignificant.
- Research groups led by women had a balanced gender distribution or were female-dominated significantly more often than groups led by men in all fields of science. This also applied to male-dominated fields such as engineering and science. In these fields, research groups also include more men. Likewise, research groups led by men often included more men as members.

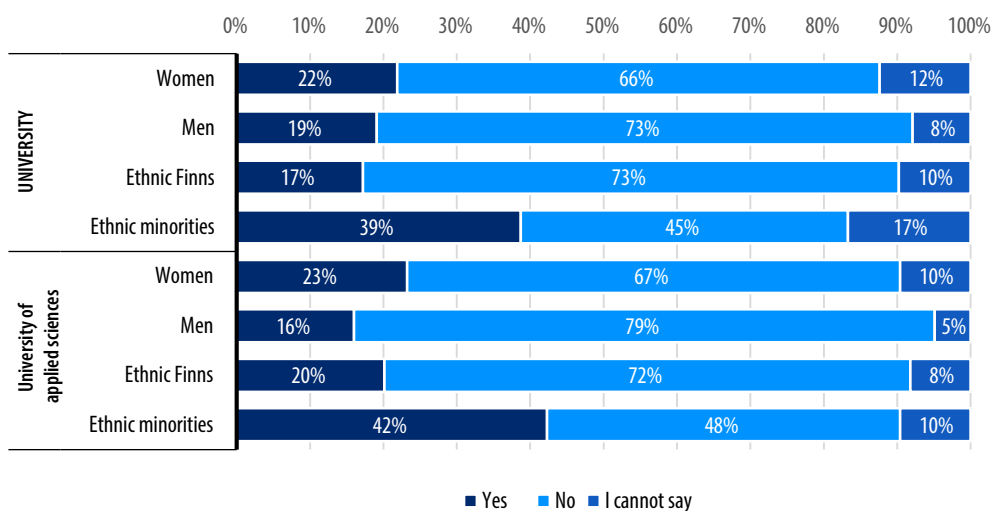
5.1 Experiences of discrimination and reporting of discrimination

On the whole, experiences of discrimination are quite common in higher education institutions, with more than one fifth of the survey respondents saying they had experienced discrimination in the past two years. Harassment was significantly less common. Respondents belonging to ethnic minorities experienced much more discrimination and harassment than ethnic Finns. They also had poorer experiences of non-discrimination in the work community and found more frequently that reporting harassment or discrimination could lead to problems. The results of the questions

discussed here are reviewed in greater detail in the separate survey report, in Appendix 2, chapters 8 and 9.

Women in both universities of applied sciences and universities reported having experienced discrimination slightly more often than men. The largest difference in experiences of discrimination was found between respondents from ethnic minorities and ethnic Finnish respondents. Of ethnic minority respondents, 42.3% in universities of applied sciences and 38.7% in universities reported having experienced discrimination. This is nearly twice that reported for ethnic Finnish respondents. What was noticeable was the relatively large share – approximately 10 per cent – of “no opinion” responses. As indicated in research literature, it is not always easy or straightforward to identify discrimination. (See Figure 7.) The gender differences and differences between ethnic groups were nearly the same size regardless of the field of science. The same differences were also found when asking about the observation of discrimination experienced by others. Women had observed discrimination slightly more often than men, and ethnic minorities nearly twice as often as ethnic Finns (see Appendix 2, chapter 9.6). Personal experiences of discrimination appear to make one more sensitive to observing discrimination against others.

Figure 7. The proportions of respondents who had experienced discrimination, by gender and ethnic background.



The discrimination described in open-ended responses can be roughly divided into two types. In the first, discrimination is related to the behaviour of a specific person, typically the immediate supervisor, and affects career advancement or competence assessment. In many cases, scholarly disputes and disagreements about operating methods were cited

as the reason, but some respondents felt that the discriminating behaviour was related to their personal properties such as gender, ethnic background or age. The open-ended responses clearly indicated that the hierarchic nature of universities, in particular, make this kind of discrimination very problematic. Discrimination on the part of the supervisor or a leader in an important position in the unit may be a considerable hindrance to career advancement. The fear of consequences also makes it difficult to describe and report experiences. The second typical type of discrimination is of a more general kind and is more clearly linked to the respondent's non-professional characteristics. Respondents who had experienced this type of discrimination felt that they had been discriminated against by the higher education institution, students or funders and that the problems were often related to structures. The responses of ethnic minority respondents also included references to racism, but more commonly, the problems were related to language and the opportunities for career advancement of non-Finnish speakers.

According to the survey, discrimination has been experienced especially on the part of the higher education institution's top leadership, immediate supervisors and colleagues. Funders and students, as well as individuals and operators outside higher education institutions were mentioned much less frequently. Discrimination was usually related to career advancement, competence assessment, pay and recruitment. No significant, recurring differences were detected in the responses of different groups. Women reported more discrimination by their immediate supervisors than men, while top leadership was mentioned more often in the responses of men. Men and ethnic minorities had experienced more discrimination against students in both universities and universities of applied sciences. Respondents from ethnic minorities mentioned funding and funders more commonly than ethnic Finns in all aspects of discrimination. (For further details, see Appendix 2, chapter 9.3).

According to the survey, reporting and addressing discrimination is still rather uncommon in higher education institutions. Two thirds of the respondents who had experienced discrimination had not reported it to anyone. However, the responses do not clearly indicate why such a large proportion of experiences are left unreported. Do the targets feel the discrimination was not serious enough, are they afraid of the consequences of reporting or are there other reasons working in the background? When discrimination was reported, it was typically reported to the immediate supervisor (see tables 14 and 15). Elected representatives or the labour protection representative, as well as friends and colleagues were often indicated in the option of "someone else". Reporting discrimination rarely resulted in any action. More than 55 per cent of the respondents who had reported discrimination said the discrimination they had experienced had not been addressed despite the reporting. According to those who had experienced discrimination, a good result was achieved in only 10 per cent of the cases. More than a quarter of the

respondents who had reported discrimination said that the reported discrimination was addressed but the result was not good in their opinion.

The survey results indicate that a large proportion of the experiences of discrimination in higher education institutions remain hidden. Men report discrimination less frequently than women. However, the male respondents who had experienced discrimination rarely reported it to anyone and if they did, the matter was not addressed as frequently as discrimination reported by women. The underlying reasons cannot be determined based on the survey, but the gender difference was notable, especially in universities. Moreover, the discrimination of ethnic minority respondents was addressed less frequently, especially in universities, even though they reported their experiences equally as frequently as ethnic Finnish respondents.

Table 14. Discrimination reporting by gender.

	Univ. of appl. sci., men	Univ. of appl. sci., women	University, men	University, women
n	45	147	123	199
I did not report the discrimination I experienced	56%	59%	74%	60%
Other reason	11%	14%	3%	11%
Immediate supervisor	24%	24%	15%	20%
Equality and non-discrimination adviser	13%	4%	6%	7%
Top leadership	9%	10%	10%	12%

Table 15. Discrimination reporting by ethnic background.

	Univ. of appl. sci., ethnic Finns	Univ. of appl. sci., ethnic minorities	University, ethnic Finns	University, ethnic minorities
n	177	22	222	104
I did not report the discrimination I experienced	58%	50%	65%	66%
Other reason	14%	9%	8%	8%
Immediate supervisor	24%	32%	19%	16%
Equality and non-discrimination adviser	6%	9%	5%	12%
Top leadership	8%	18%	9%	13%

The survey also sought information about the respondents' experiences of various forms of harassment⁵. Overall, experiences of harassment were quite uncommon. Being interrupted while speaking or being subjected to offensive comments, was the most commonly experienced form of harassment. Less than one tenth of the respondents had experienced direct threats or physical harassment in the past two years. Especially experiences of physical harassment were likely affected by the coronavirus pandemic, which meant that most of the work at higher education institutions was also carried out remotely during the past two years. Without the pandemic, experiences of physical harassment, in particular, might have been more common.

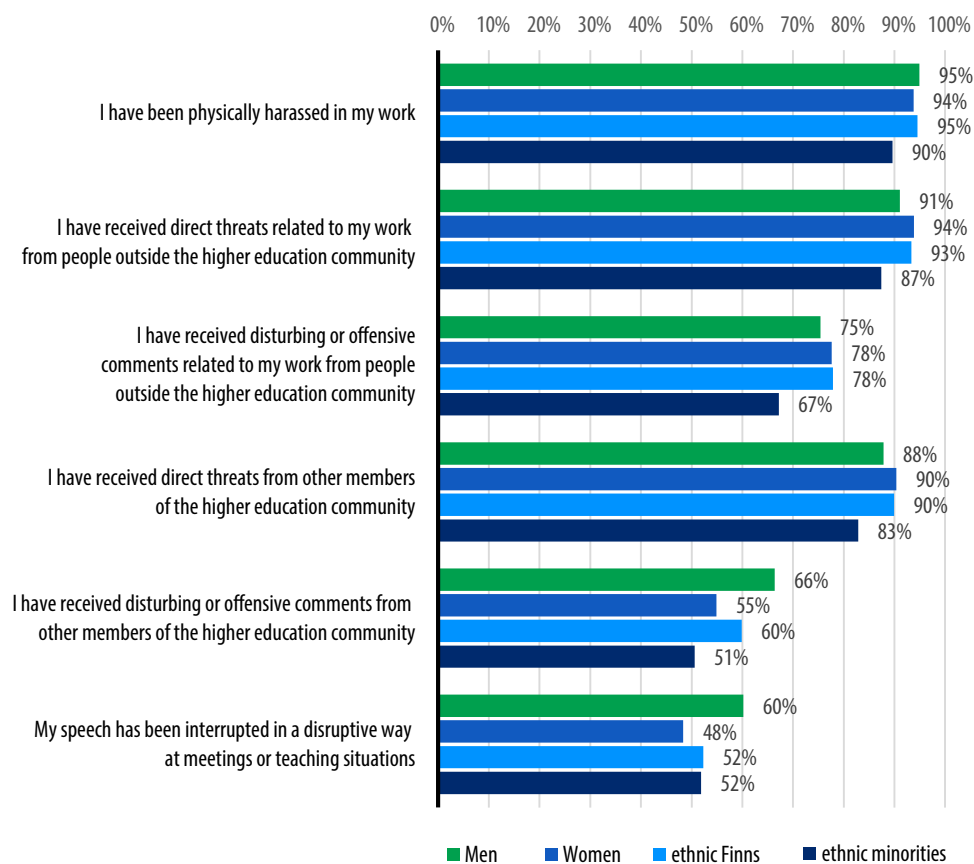
No significant gender differences were observed in the averages for the responses or between ethnic groups. Nevertheless, differences were noted between the groups when examining the proportion of respondents who had never experienced harassment. In universities of applied sciences, speech is interrupted more commonly than in

⁵ In the questionnaire, harassment was defined as "the deliberate or de facto infringement of the dignity and integrity of a person. In harassment, a person's behaviour creates an intimidating, hostile, degrading, humiliating or offensive environment for another person related to prohibited grounds for discrimination, such as sexual orientation, origin or disability.

Behaviour is understood broadly so that it also includes email messages, facial expressions, gestures or the display of inappropriate material, for example online, or other kinds of communication. The behaviour infringing dignity does not need to be directly aimed at a specific individual; it may also be aimed at a group of people". (For further details, see Appendix 2.)

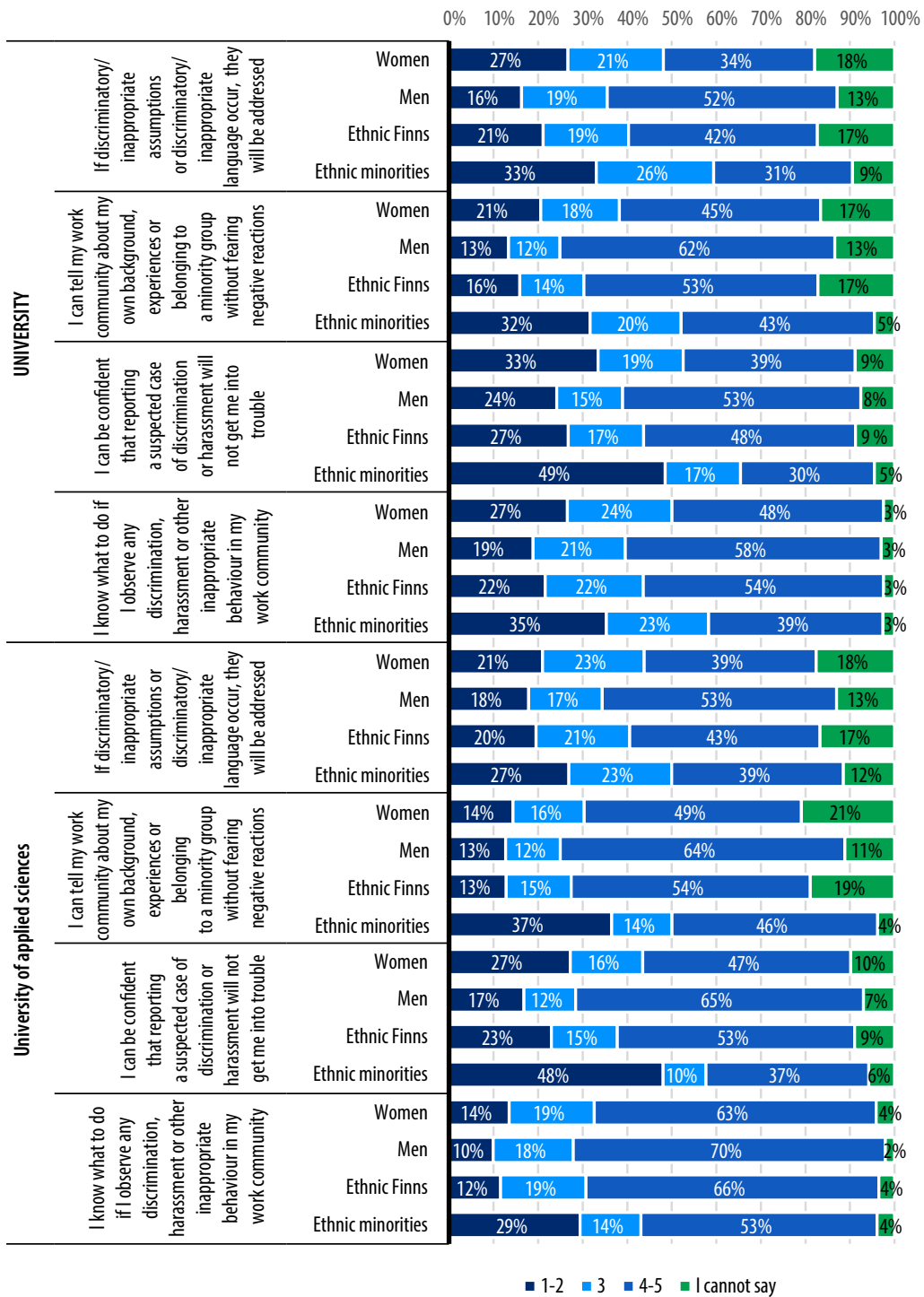
universities, but otherwise the distribution in responses was very similar. Women in both universities and universities of applied sciences had experienced disturbing interruptions of their speech more frequently during teaching and received more disturbing or offensive messages from members of the higher education community. In turn, men had experienced direct threats somewhat more frequently. Respondents from ethnic minorities had been harassed and threatened more frequently than ethnic Finns by both members of the higher education community and outsiders (see Figure 8). Recent public discussion has often focused on the hate speech and harassment targeted at researchers from outside their community. However, the survey respondents had met with more discrimination, insults and threats within their higher education community. Based on this, to create a safe working environment for different groups, special attention should be paid to the internal operations of higher education institutions, not forgetting that external harassment is also a phenomenon to be taken seriously.

Figure 8. The proportion of the option “1 = Never” among respondents of different genders and ethnic backgrounds.



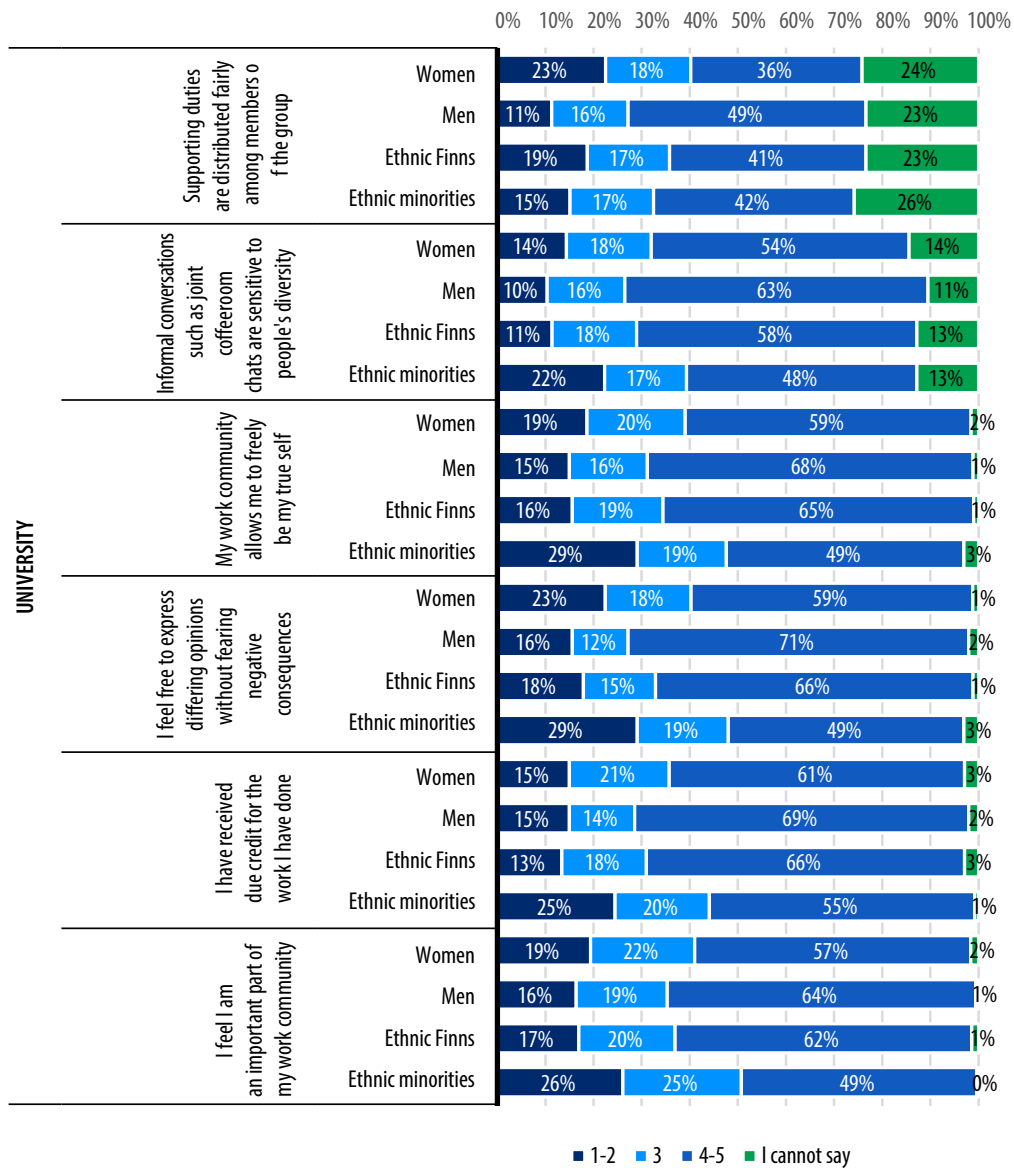
The survey also included four statements related to the addressing and reporting of discrimination and harassment. According to the responses to these statements, much remains to be done to address harassment in higher education institutions. The responses highlight the different gendered experiences and different experiences in different ethnic groups. Respondents belonging to the most discriminated groups – that is, women and especially ethnic minorities – were not as clear about the measures to take if they observed harassment in the work community. They also experienced notably more often than men and ethnic Finns that reporting discrimination or harassment could cause problems for themselves. Gender and ethnic group differences were also noted concerning their experiences of activities in the work community and their inclusion in the community. (See Figure 9.) Gendered differences faded in an analysis by career levels, but the differences between ethnic minorities and ethnic Finns remained very significant on all career levels.

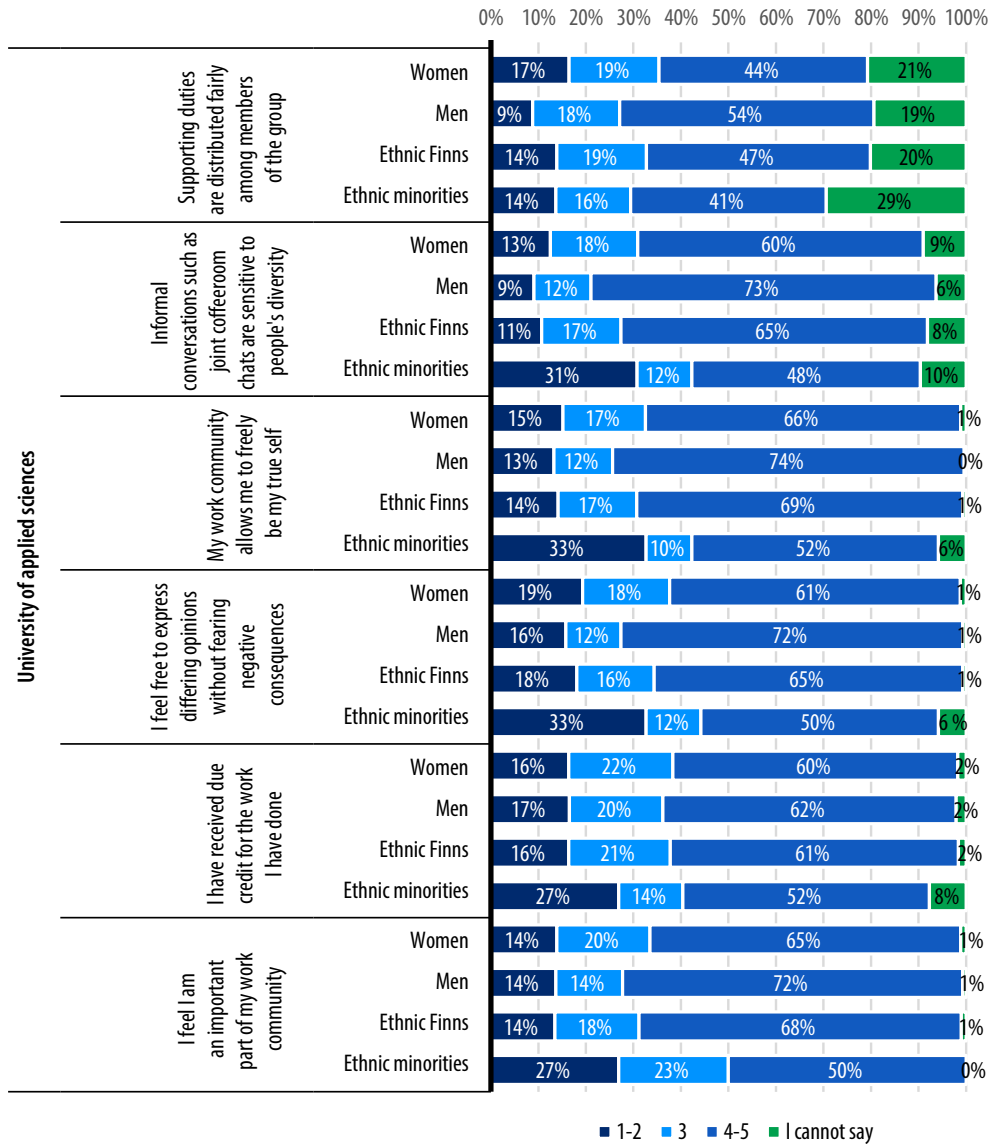
Figure 9. Statements concerning discrimination and harassment, distribution of responses by gender and ethnic background on a scale of 1 = fully disagree ... 5 = fully agree.



The respondents' experiences of equality in their work community were also surveyed with the help of statements. These responses paint a very similar picture to that offered by the statements related to discrimination and harassment. Women's responses to the statements were more often negative than men's, but the differences were small and faded nearly completely in an analysis by career level. The most significant gender difference was that for women, the diversity of work communities in higher education institutions was more important than for men. Regardless of career level, respondents from ethnic minorities experienced more often than ethnic Finns that they did not receive recognition and respect for their work. They also felt more often that they could not freely express themselves or deviating opinions in their work community without fear of negative consequences. (See Figure 10.) In other words, the groups that are more vulnerable often experienced their work community as less equal and thus their own opportunities to participate in the community's activities and networking as less favourable.

Figure 10. Statements about equality in the work community, distribution of responses by gender and ethnic background on a scale of 1 = fully disagree ... 5 = fully agree.





5.2 Diversity of research groups

The survey included a separate section on work in research groups. Practical research work in higher education institutions usually takes place in research groups, and they are a key work environment for many members of the teaching and research staff. Moreover, research groups are key to the advancement in an academic career as they provide opportunities for joint publications, funding applications, research projects and networking, among other things. Based on the literature review, hardly any prior research has been carried out in Finland focusing on equality in research groups. Therefore, special attention was paid to the equality and composition of research groups in the KOTAMO survey. Indeed, interesting observations were made in this respect. The gender of the

research group's director had a notable impact on the group's gender distribution. Groups led by women were female-dominated, and those led by men were male-dominated. No similar difference based on the director's gender was seen in the group's ethnic diversity. Research group directors also found the work atmosphere and equality of their research group to be better than the members of the group. Overall, the work atmosphere of research groups was considered to be good.⁶

If the respondents' job description included research, they were asked whether they worked as part of a research group or whether they led a group. Work in research groups was significantly more common in universities. Of the respondents working in universities, 19 per cent did not belong to any research group, and this was slightly more common among women than men. In universities of applied sciences, 41 per cent of the respondents pursuing research did not belong to any research group (see tables 16 and 17). No significant gender or ethnic group differences were observed as to the proportion of those working in research groups. Regarding fields of science, the proportion of respondents who did not belong to a research group was considerably larger in the arts and humanities (45 per cent) and in the social sciences (31 per cent). In medicine, science and engineering, only around one tenth of the respondents were not part of a research group. In universities, men worked as research group directors more often than women.

Table 16. Inclusion in research groups based on gender.

	Univ. of appl. sci., men	Univ. of appl. sci., women	University, men	University, women
Yes, I work as the director of at least one research group	9.9%	11.7%	30.6%	21.7%
Yes, but I am not the director of any research group	49.4%	47.5%	52.6%	57.2%
I do not work in a research group at present	40.7%	40.8%	16.8%	21.1%

⁶ The results of the questions discussed here are reviewed in greater detail in the separate survey report in Chapter 7. The report is available on the KOTAMO website at <https://okm.fi/kotamo>.

Table 17. Inclusion in research groups based on ethnic background.

	Univ. of appl. sci., ethnic Finns	Univ. of appl. sci., ethnic minorities	University, ethnic Finns	University, ethnic minorities
Yes, I work as the director of at least one research group	10.9%	12.5%	26.1%	21.9%
Yes, but I am not the director of any research group	49.0%	43.8%	54.6%	58.3%
I do not work in a research group at present	40.1%	43.8%	19.3%	19.8%

The respondents who did not work as part of a research group were asked whether they would like to do research as part of a group. The purpose was to determine whether the respondents had voluntarily decided not to join a research group or whether they were not allowed to join groups despite being interested in doing so. Of the men, a larger proportion of the respondents working outside groups did not want to be part of a research group, neither in universities nor universities of applied sciences. In turn, female respondents working in universities chose the “no opinion” option more frequently than male respondents. Respondents from ethnic minorities wanted to be part of a research group more often than ethnic Finnish respondents, both in universities and universities of applied sciences.

Respondents who had been excluded from research groups against their own will were also asked what they believed was the reason for this. Compared to respondents from universities of applied sciences, university respondents cited more frequently the lack of networks, their research topic and the established practices in their field of science. In turn, respondents from universities of applied sciences indicated the lack of academic merit more frequently as the reason. In this respect, no significant recurring gender-based differences were observed in universities and universities of applied sciences except for the proportion of respondents who felt they were discriminated against based on their non-professional characteristics. The majority of them were men. Of the men who were not part of research groups, 15 per cent said it was due to non-professional characteristics, compared to 8 per cent of women. Discrimination based on non-professional characteristics was even more prominent among respondents from ethnic minorities compared to ethnic Finnish respondents. The lack of networks was cited much more frequently by ethnic minority respondents than ethnic Finnish respondents, especially in universities (see tables 18 and 19).

Table 18. Reasons for not participating in a research group, by gender.

	Univ. of appl. sci., men	Univ. of appl. sci., women	University, men	University, women
n	27	53	60	120
Lack of academic merit	26%	34%	13%	19%
Other reason	56%	36%	18%	18%
Discrimination based on a non-professional characteristic	15%	11%	15%	7%
Practices in the field of science	11%	11%	23%	28%
Topic of research	30%	13%	25%	38%
Difficulty obtaining funding	19%	21%	28%	30%
Lack of networks	11%	17%	33%	38%

Table 19. Reasons for not participating in a research group, by ethnic background.

	Univ. of appl. sci., ethnic Finns	Univ. of appl. sci., ethnic minorities	University, ethnic Finns	University, ethnic minorities
n	70	9	144	39
Lack of academic merit	33%	22%	18%	15%
Other reason	43%	44%	18%	18%
Discrimination based on a non-professional characteristic	9%	44%	7%	26%
Practices in the field of science	11%	11%	28%	28%
Topic of research	20%	0%	34%	33%
Difficulty obtaining funding	20%	22%	32%	15%
Lack of networks	16%	11%	31%	56%

To examine the diversity of research groups, respondents were asked to evaluate the gender distribution and ethnic distribution of their research groups. One quarter of the respondents worked in research groups with a balanced gender distribution (gender

proportions within the range of 40–60 per cent), 43 per cent in female-dominated groups and 32 per cent in male-dominated groups. Women worked more often in predominantly female research groups and men in predominantly male research groups. This difference can be largely explained by the horizontal gender segregation between fields of science. The fields of engineering and science stood out of the rest. Of the research groups in engineering and technology, 64 per cent were male-dominated and of those in science, 38 per cent. However, the research groups in these fields had ethnically more diverse research groups than other fields. In science, 10 per cent of the respondents worked in research groups that comprised only white Finnish members, and in engineering and technology, the corresponding figure was 15 per cent. In all other fields, at least one quarter of the respondents worked in groups that comprised only white ethnic Finns. This also explains why respondents from ethnic minorities work more often in male-dominated groups.

In the survey, special attention was also paid to the gender distribution of research group directors. In universities, men and ethnic Finnish respondents were proportionally slightly more frequently directors of research groups than women and ethnic minorities. In universities of applied sciences, the differences between respondent groups were insignificant (see tables 16 and 17.). Respondents who worked only as members of research groups were asked what gender their research group director was. Men in both universities and universities of applied sciences worked more often in research groups led by men. In universities of applied sciences, women worked more often in groups led by women, while in universities, women respondents worked in groups equally led by women and men. In universities, respondents from ethnic minorities worked more frequently in groups led by women. In universities of applied sciences, the distribution was equal, but the number of respondents was also very small. Overall, the differences were quite small. (See tables 20 and 21).

Table 20. Gender of research group director, by respondent's gender.

	Univ. of appl. sci., men	Univ. of appl. sci., women	University, men	University, women
n	81	142	306	479
Female	40.7%	67.6%	31.4%	49.7%
Male	54.3%	31.0%	64.7%	48.2%
Other	0.0%	0.0%	0.0%	0.2%
I prefer not to answer	4.9%	1.4%	3.9%	1.9%

Table 21. Gender of research group director, based on respondent's ethnic background.

	Univ. of appl. sci., ethnic Finns	Univ. of appl. sci., ethnic minorities	University, ethnic Finns	University, ethnic minorities
n	214	14	647	143
Female	58.4%	50.0%	44.8%	36.4%
Male	38.8%	50.0%	52.4%	60.8%
Other	0.0%	0.0%	0.2%	0.0%
I prefer not to answer	2.8%	0.0%	2.6%	2.8%

Based on prior research, the gender of the research group's director can also correlate with the research group's gender distribution and ethnic diversity. To study this aspect, the survey examined the gender distribution and ethnic diversity of research groups, as indicated by respondents working as research group members, and these were compared to the gender of the research group's director. The gender of the research group director had a considerable impact on the entire group's gender distribution in both universities and universities of applied sciences. In all fields of science, research groups led by women had a balanced gender distribution or were female-dominated significantly more often than groups led by men. This also applied to male-dominated fields such as engineering and science. In these fields, research groups also include more men. Likewise, research groups led by men often included more men as members (Table 22). In terms of ethnic diversity, a similar difference based on the gender of the research group's director was not systematically observed. Instead, the group's composition mainly mirrored the distribution typical in the field. As a rule, university research groups were ethnically more diverse than research groups in universities of applied sciences. The survey results indicate that if the goal is to break down the horizontal gender segregation between fields of science – as referred to, for example, in the frequently expressed goal in literature and interviews of attracting more women into the STEM disciplines – one important way of doing this would be to use funding and other measures to support as equal a gender distribution as possible among research group directors. However, it would also be important to promote gender and ethnic diversity in research groups in all fields. This was also noted in the open-ended responses, in which many of those who had not received a place in a research group felt that this had much to do with the group homogeneity in their field of research. Similar responses were provided by respondents from gender minorities in their field – by both men and women – as well as by respondents from an ethnic minority.

Table 22. Gender distribution of research groups in different fields of science, by the research group director's gender.

	Natural sciences		Engineering and technology		Medical and health sciences		Agriculture and forestry		Social sciences		Arts and humanities		Other sciences	
	Female	Male	Female	Male	Female	Male	Female	Male	Female	Male	Female	Male	Female	Male
n	78	99	60	219	86	76	11	<5	144	90	53	21	43	20
0 per cent men, only women or non-binary persons	9.0%	0.0%	1.7%	0.0%	7.0%	0.0%	27.3%	0.0%	16.7%	0.0%	17.0%	0.0%	16.3%	0.0%
1–39 per cent men, 99–61 per cent women or non-binary persons	51.3%	18.2%	31.7%	7.8%	69.8%	28.9%	36.4%	33.3%	60.4%	23.3%	62.3%	23.8%	62.8%	35.0%
40–59 per cent men, 60–41 per cent women or non-binary persons	25.6%	23.2%	36.7%	17.4%	19.8%	46.1%	36.4%	33.3%	18.8%	25.6%	15.1%	42.9%	16.3%	35.0%
60–99 per cent men, 40–1 per cent women or non-binary persons	14.1%	51.5%	30.0%	67.1%	3.5%	23.7%	0.0%	33.3%	4.2%	46.7%	5.7%	33.3%	4.7%	30.0%
100 per cent men, no women or non-binary persons	0.0%	7.1%	0.0%	7.8%	0.0%	1.3%	0.0%	0.0%	0.0%	4.4%	0.0%	0.0%	0.0%	0.0%

The survey included statements about research groups to find out more about the respondents' experiences of the treatment and atmosphere in research groups. In general, the experiences concerning equality in research groups were quite positive. Gender equality and the treatment of individuals within research groups were found to be good. Problems related to gender equality and non-discrimination appear to play out in larger organisation structures, such as units or the entire higher education institution. As for research groups, the biggest problem related to them is getting on board. In terms of gender and ethnic background, small but similar differences were detected. In all statements, women's experiences of the atmosphere and equality of working groups was on average weaker than those of men. Likewise, respondents from ethnic minorities felt that the treatment and atmosphere in groups were on average weaker compared to ethnic Finnish respondents. Moreover, women and ethnic minority representatives considered the diversity of research groups to be much more important than men and ethnic Finnish respondents.

An analysis based on the research group director's gender did not bring up major differences in the responses. In universities of applied sciences, respondents working in groups led by men rated the research group's atmosphere, recognition and treatment for all the statements slightly lower than the respondents working in groups led by women, but the differences were quite small. Instead, there appears to be a clear difference between research group directors and members in the way they experience the equality of the work environment. The respondents working as research group directors rated the equality and atmosphere of their research group to be better than respondents who were members of research groups but not directors of any group. This applied to both universities and universities of applied sciences (Table 23). It appears that experiences of inequality are more common in research groups than the group directors assume, but it is also true that the group members are quite satisfied with the situation overall.

Table 23. Statements about research groups, averages of responses based on the respondent's position on a scale of 1 = fully disagree ... 5 = fully agree.

	Univ. of appl. sci., research group directors	Univ. of appl. sci., research group members	University, research group directors	University, research group members
n	53	232	379	821
My research group has played an important role in my academic career advancement	3.3	2.8	3.9	3.8
The treatment of people in my research group is equal and non-discriminating	4.5	4.0	4.6	4.2
In my research group, everyone gets equal opportunities to speak	4.1	3.9	4.4	4.0
In my research group, all the members are appreciated	4.4	4.1	4.7	4.2
In my research group, duties are distributed fairly	3.9	3.7	4.1	3.8
In my research group, the credit for a job well done goes to those who deserve it	4.2	3.9	4.5	4.1
The atmosphere in my research group is such that everyone can freely express their ideas and opinions	4.5	4.2	4.6	4.1
I believe it is important to strive for diversity in the composition of research groups (e.g. that the group includes different genders and people with different ethnic backgrounds)	4.1	3.9	3.9	3.8

6 Promotion of gender and ethnic equality

In the KOTAMO project, a survey and research literature were used to study the higher education community's experiences of the promotion of equality in higher education institutions and the measures used for this. The key findings related to these topics included the following:

- In the Nordic countries, statistics on higher education, with a focus on gender, have been collected since the 1980s, and equality and gender research has been funded and conducted, which has helped identify and address gender equality issues in universities (Bergman and Rustad 2013).
- Legislation requiring the promotion of gender equality, as well as higher education and science policies have influenced the equality work in higher education institutions (ibid.).
- Since the beginning of 2022, the Horizon Europe research framework programme has required that all funded organisations publish a gender equality plan (European Commission 2021). This means that European research funding contributes to gender equality measures and requires that higher education institutions and other research institutes adopt them.
- The survey on the promotion of gender and ethnic equality painted a varying image. While the promotion of gender equality and non-discrimination is considered important, experiences of the adequacy of measures varies by respondent group. Male and ethnic Finnish respondents found the current measures to function better than female and ethnic minority representatives. Respondents in a higher position also considered the current measures to function better than did respondents lower in the hierarchy.
- Equality and non-discrimination work is understood and experienced in different ways. The examination revealed the gendered nature of the world of higher education and experiences of it being more difficult for ethnic minority representatives to join networks and advance in their career – often because of reasons related to language.
- Some of the higher education institutions and units are progressive in that they pay broad attention to diversity, but being hierarchic and rigid organisations, higher education institutions have various practices that promote unequal treatment.

- Some of the respondents found that the definition of equality was too narrow in higher education institutions and the survey. Age, disability, social class and sexual orientation were mentioned as aspects that do not receive proper attention in the present equality work in Finnish higher education institutions.

6.1 Assessments of equality promotion measures in the literature review

The measures used to promote equality in different countries and different higher education institutions have been assessed in research literature. A Nordic report (Bergman and Rustad 2013) describes national measures and measures of individual higher education institutions in Finland, Sweden, Norway, Denmark and Iceland. The report highlights two factors that have significantly boosted equality work in the Nordic countries. First, statistics on higher education, with a focus on gender, have been collected in the Nordic countries since the 1980s. Second, equality and gender research has been funded and conducted in the Nordic countries, and this has helped identify and address gender equality issues in universities. What is more, legislation requiring the promotion of gender equality, as well as higher education and science policies have influenced the equality work in higher education institutions. (Bergman and Rustad 2013). Statistics, research, legislation and science policies continue to be important means for promoting equality.

A recent Finnish study (Pietilä 2021) compared the equality measures adopted in Finnish universities with those used in Swedish and Norwegian universities. The results indicate that compared to Sweden and Norway, Finnish universities have used few measures targeting women and positive action to promote gender equality. In Swedish universities measures for women averaged 1.5 per university and in Norway 2.9 per university, whereas in Finland the average was 0.1 per university (Pietilä 2021, p. 532). On the other hand, measures emphasising organisational responsibility were more numerous in Finnish universities, averaging 2.1 measures per university. Finnish universities had used slightly fewer measures aiming for behavioural change compared to the reference countries, but nevertheless an average of 1.5 measures per university.

Research literature on equality work also illustrates the challenges, opposition and battles in equality work. Equality work calls for negotiation skills, and it is also opposed. People pursuing equality work are not always appreciated even though equality work is considered valuable in Finland (Brunila and Ylöstalo 2013). Finnish studies have described these confrontations in the equality work of upper secondary institutions (Ikävalko 2016;

Ikävalko 2014; Ikävalko and Kantola 2017), as well as in equality training, where there is space only for gender equality pedagogy instead of feminist pedagogy (Ylöstalo and Brunila 2018). Jeff Hearn (2021) has listed typical ways of resisting gender equality work in academia. Talk about equality work can be resisted, for example, by refusing to name men as men, thus making their privileges more difficult to address. This may lead to focusing on individuals and away from gender relations and gender inequalities (Hearn, 2021, p. 104).

Organisations granting research funding play an important role in promoting equality in RDI and research careers, in particular. For example, the Academy of Finland requires gender equality and non-discrimination to be promoted in the research it funds (Academy of Finland, 2021c). In practice, this means paying attention to the balanced gender representation in the funded projects and the research groups' leadership, as well as in the decision-making bodies and assessment panels of organisations granting research funding. The Academy also strives to eliminate and prevent structural inequality by offering flexibility to help coordinate family and working life and by funding mobility to support networking. In addition, the Academy's assessments take into account whether the proposed research promotes equality and non-discrimination within the project or in society in general. (Academy of Finland, 2021c.) The statistics (Academy of Finland, 2019) indicate that the Academy has been largely successful in carrying out its equality objectives. Among Academy Professors (the most prestigious of Academy funded positions), the proportion of women has long been small, but in the last round of Academy Professor appointments in 2020, three of the ten appointed Academy Professors were women.

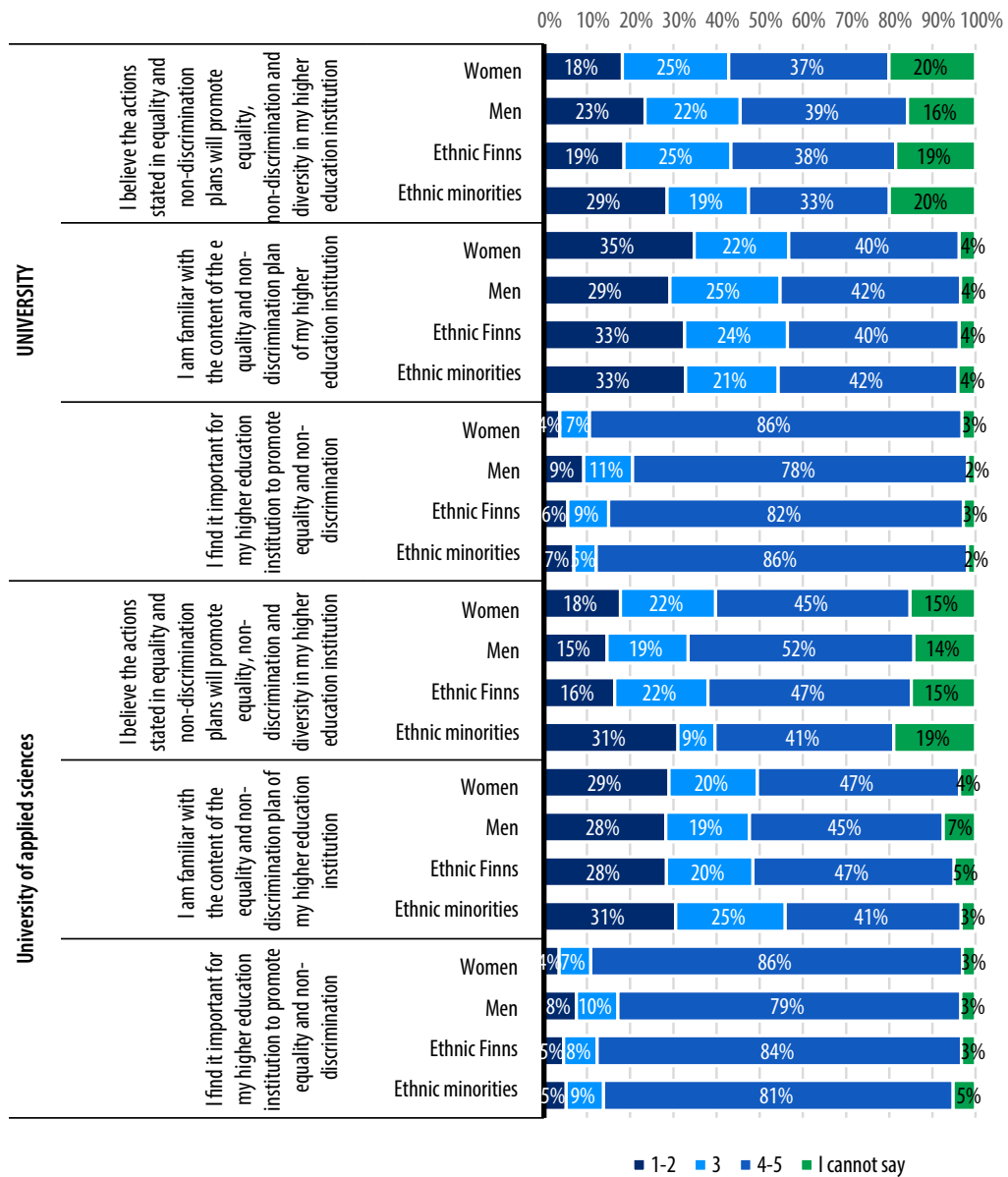
For years, the promotion of gender equality has also been an important dimension of the policies of the European Research Area (ERA) and the EU's research framework programmes. Equal gender representation is taken into account in the assessment of applications and selection of reviewers, as well as in the assessment of funded research groups. The gender perspective must be considered in the content of research, and it is part of the assessment of applications. Research on gender inequality and intersectional inequality receives separate funding. As a new measure in force since the beginning of 2022, the Horizon Europe research framework programme requires that all funded organisations publish a gender equality plan (European Commission 2021). This means that European research funding contributes to gender equality measures and requires that higher education institutions and other research institutes need to adopt them to be eligible for European funding.

6.2 Experiences of the promotion of equality – what the survey tells us

The survey on the promotion of gender and ethnic equality painted a varying image. While the promotion of gender equality and non-discrimination is considered important, experiences of the adequacy of measures varies by respondent group. Male and ethnic Finnish respondents found the current measures to function better than female and ethnic minority representatives. Respondents in higher positions also considered the current measures to function better than did respondents in lower positions. The results of the questions discussed here are reviewed in greater detail in the separate survey report in Appendix 2, Chapter 10.

According to the survey, equality work in higher education institutions has solid support among teaching and research staff. The majority – 60 per cent – of all the survey respondents fully agreed with the statement that equality and non-discrimination work is important in their higher education institution. While women and respondents from ethnic minorities were more likely to consider equality work very important, most of the respondents agreed with the statement (Figure 11). The responses may have been influenced by the selection of respondents, as well as the phenomenon of social desirability, meaning that the respondents offered more positive assessments because they knew about the goals and perspective of the KOTAMO project. Regardless, the results strongly indicate that gender equality and non-discrimination are considered important values among the teaching and research staff of higher education institutions. The questions on the promotion of equality were also answered by respondents from administration, which points to equality being appreciated in administration, as well.

Figure 11. Statements about equality and non-discrimination work, distribution of responses by gender and ethnic background on a scale of 1 = fully disagree ... 5 = fully agree.



However, the open-ended responses also showed that equality and non-discrimination work is understood and experienced in different ways. The respondents widely described the gendered nature of the world of higher education and their experiences of it being more difficult for ethnic minority representatives to join networks and advance in their career – often because of reasons related to language. According to the open-ended

responses, at least some of the higher education institutions and units are progressive in that they give broad attention to diversity, but as they are also hierarchic and rigid organisations, these same higher education institutions have various practices that promote unequal treatment.

A small group of respondents felt that at least some forms of gender equality and non-discrimination work were not suitable for meritocratic higher education institutions. This group of respondents considered it a risk that gender equality measures may go too far in one way or another. Many of them said they were worried about gender equality work leading to a situation where the most qualified and suitable applicant cannot be appointed to the vacancy. These respondents usually emphasised that they considered gender equality and non-discrimination work to be generally important even though they felt that the related measures could have harmful consequences. A minor share of the respondents questioned the need for gender equality work in the first place. They criticised measures related to gender equality as being ideological or politicised and they also criticised the questionnaire and the very setup of the KOTAMO project.

The third group that stood out in the open-ended responses consisted of those who felt that the definition of gender equality in higher education institutions – and in the KOTAMO survey – was too narrow. In their view, focusing solely on a few dimensions of equality – in this case, gender and ethnicity – hides other structures creating inequality and features that expose people to discrimination. Age was the most commonly mentioned aspect. In their open-ended responses, many participants described their experiences and views according to which people who pursued an academic career at a young age are in a considerably better position, especially in terms of career advancement. This was particularly noticeable in universities, where the introduction of the tenure track system was indicated by many respondents as a factor aggravating the situation. In this context, in addition to age, respondents mentioned disability, social class and sexual orientation, pointing out that these aspects have poor visibility in the higher education institutions' current gender equality and non-discrimination efforts.

Very few practices that clearly promote gender equality were mentioned in the open-ended responses. The ones mentioned were nearly always connected to the immediate work environment, including the operating methods adopted in the respondent's own unit or research group. According to the survey, the respondents were quite familiar with the content of gender equality and non-discrimination plans in higher education and considered the measures to be somewhat effective. In this respect, the responses were clearly more divided than in questions concerning the importance of gender equality and non-discrimination work. The respondents' experiences of the effectiveness of measures included in the gender equality and non-discrimination plans varied especially among respondents from ethnic minorities. In addition, the proportion of "no opinion" responses

was noticeably large (see Figure 11 above). It appears that individual staff members find it difficult to evaluate or gain broad insight into the plans' measures and their impacts.

This also came up in questions about the respondents' experiences of measures promoting gender equality in the higher education institution and unit. More than one third of the respondents chose the "no opinion" option for statements about the effectiveness of measures. No differences were detected between the responses concerning higher education institutions and individual units. However, there was significant variation in the experiences of different respondent groups. Female respondents rated the communication and measures concerning both gender equality and ethnic equality to be systematically weaker than male respondents. Respondents belonging to ethnic minorities more frequently experienced measures related to ethnic equality insufficient. Notable differences also came up in the analysis by career level. Respondents at higher career levels rated communication and measures higher, especially in universities (tables 24 and 25 below). The gender differences decreased at the top levels, but respondents from ethnic minorities experienced equality-related communication and measures to be weaker than ethnic Finns at all career levels. Statements concerning the promotion of equality were also posed to respondents from the administration of higher education institutions, as they play an important role in implementing measures to promote equality. Respondents working in administration also considered gender equality and non-discrimination work to be important. Their opinions and experiences about equality measures resembled those of teaching and research staff at the higher career levels. However, respondents working in administration in universities of applied sciences were slightly more critical than respondents representing top leadership.

Table 24. Statements about measures promoting gender equality and ethnic equality, averages by career level (I to IV) on a scale of 1 = fully disagree ... 5 = fully agree (respondents from universities).

UNIVERSITY	Level I	Level II	Level III	Level IV	Other member of research or teaching staff	University administration
n	412	351	419	232	117	48
The leadership of my higher education institution actively communicates about gender equality, non-discrimination and diversity	3.2	3.3	3.4	3.6	3.4	3.5
My higher education institution strives to actively promote gender equality in practice	3.1	3.3	3.3	3.5	3.2	3.5
My higher education institution strives to actively promote ethnic equality in practice	3.0	3.2	3.3	3.3	3.2	3.3
The leadership of my unit actively communicates about gender equality, non-discrimination and diversity	2.8	3.1	3.2	3.5	3.0	3.3
My unit strives to actively promote gender equality in practice	3.1	3.3	3.3	3.6	3.1	3.6
My unit strives to actively promote ethnic equality in practice	3.0	3.2	3.2	3.4	3.2	3.4
I believe that the measures adopted in my higher education institution and/or unit have improved the state of gender equality	3.1	3.2	3.2	3.5	3.3	3.6
I believe that the measures adopted in my higher education institution and/or unit have improved the state of ethnic equality	3.0	3.1	3.2	3.3	3.4	3.5

Table 25. Statements about measures promoting gender equality and ethnic equality, averages by career level on a scale of 1 = fully disagree ... 5 = fully agree (respondents from universities of applied sciences).

UNIVERSITY OF APPLIED SCIENCES	Lecturer	Principal lecturer	Director of education and training	Research, development and innovation staff	RDI director	University of applied sciences administration
n	495	82	38	296	12	95
The leadership of my higher education institution actively communicates about gender equality, non-discrimination and diversity	3.1	3.1	3.6	3.1	3.4	3.2
My higher education institution strives to actively promote gender equality in practice	3.1	3.2	3.6	3.3	3.3	3.5
My higher education institution strives to actively promote ethnic equality in practice	3.3	3.1	3.8	3.1	3.0	3.5
The leadership of my unit actively communicates about gender equality, non-discrimination and diversity	2.9	2.9	3.5	2.9	3.2	3.2
My unit strives to actively promote gender equality in practice	3.1	3.2	3.8	3.3	3.4	3.4
My unit strives to actively promote ethnic equality in practice	3.2	3.0	3.7	3.2	3.1	3.5
I believe that the measures adopted in my higher education institution and/or unit have improved the state of gender equality	3.1	3.1	3.7	3.3	3.2	3.4
I believe that the measures adopted in my higher education institution and/or unit have improved the state of ethnic equality	3.2	3.1	3.7	3.3	3.0	3.6

The survey indicates that the groups that less commonly experience discrimination also consider the existing measures and their effectiveness to be better than those who have more experiences of being at the receiving end of discrimination. Female respondents mentioned problems related to gender equality more commonly than men. In turn, respondents from ethnic minorities found the current measures aimed at promoting ethnic equality to be weaker than ethnic Finns. Moreover, compared to male and ethnic Finnish respondents, female and ethnic minority respondents considered staff diversity to be more important in both recruitment and the composition of research groups. Respondents in leading positions in individual research groups (see chapter 5.2) and in higher education institutions overall gave a higher rating to the state of equality, communication and measures than their subordinates. This disparity in personal experiences hampers the promotion of gender equality and non-discrimination, as the individuals who make decisions in higher education institutions typically belong to groups that do not experience much discrimination and it is often more difficult for them to identify different forms of inequality through their own experiences.

7 International examples of the promotion of gender equality and non-discrimination among teaching and research staff

The KOTAMO project reviewed good international practices and their impacts on the promotion of gender equality and non-discrimination in science and higher education institutions. A more detailed analysis of the suitability of the measures as such from the perspective of the Finnish higher education system and legislation did not come under the scope of this project. The operating models discussed in this chapter are described in greater detail in Appendix 2. The reports of individual countries are available in English on the KOTAMO website at <https://okm.fi/kotamo>.

Case studies were carried out in Sweden, Ireland, Norway and Spain. In Norway and Sweden, efforts to improve gender equality have been carried out for a long time, while in Spain and Ireland, the issue has been addressed and significant measures adopted more recently. For the study, two themes were selected from each country so that they represented the national level, funding level and level of higher education institutions. The goal was to choose measures that had been used to promote both diversity and equality.

Examples of good practices on the national level (see Appendix 2) include the Athena SWAN accreditation scheme from Ireland, the KIF Committee from Norway, the Women, Science and Innovation Observatory from Spain and the BALANSE programme from Norway.

Athena SWAN Charter is an accreditation scheme seeking to promote equality in higher education institutions and research institutes. The aim of Athena SWAN is to increase the number of women among the staff in Irish higher education institutions in the STEM disciplines and in other fields. The scheme addresses intersectionality, for example by paying attention to personnel with a trans-background, as well as to ethnic diversity and the underrepresentation of men in particular disciplines. The scheme was introduced in Ireland in 2015, but it is also in use in the UK, Canada, the USA and Australia. Accreditation can be sought by a higher education institution or an individual department. To get a Bronze Award (the lowest tier), applicants must assess the state of gender equality and draw up a related action plan. The Silver Award (middle tier) requires the action plan to have been successfully implemented, and the Gold Award recognises top achievements in gender equality (Higher Education Authority of Ireland, 2019). Many Irish funding agencies require applicants of research funding to have an Athena SWAN award.

The KIF Committee is appointed by the Norwegian government, with the goal of promoting gender equality and diversity in the STEM disciplines. Comprising representatives of higher education institutions and different stakeholders, the Committee brings up questions related to gender equality and diversity. The Committee supports equality work in higher education institutions, for example through guidance, dissemination of information, institutional visits and knowledge development. The Committee receives funding from Norway's Ministry of Education and Research, and it also reports regularly to the Ministry (Kifinfo, 2022).

The Women, Science and Innovation Observatory in Spain is an inter-ministerial body that oversees the measures of ministries, other administration and academia from the perspective of gender equality in science, proposing measures to support diversity and gender equality. The Observatory comprises a group of experts and a commission, with representatives from the government administration and third sector (Ministerio de Ciencia e Innovación de España, 2022).

The Norwegian BALANSE programme aims to improve gender equality in Norwegian research, focusing on professorships and academic leadership positions. It serves as a funding channel for the gender equality projects of higher education institutions, as well as a platform for knowledge-sharing and networking. The programme is funded by the Norwegian Ministry of Education and Research (Forskningsrådet, 2017).

Science Foundation Ireland (SFI) was provided as an example of funding-level measures. SFI has an active role in promoting gender equality and aims to remove obstacles hindering women's career paths in male-dominated fields and disciplines. SFI's measures in recent years include considering gender equality in the grant processes, drawing up and implementing an equality plan and offering parental leave to researchers receiving funding through SFI (Science Foundation Ireland, 2022).

As for higher education institutions, good practices were surveyed at Kristianstad University and the KTH Royal Institute of Technology in Sweden, as well as the Polytechnic University of Catalonia in Spain. Kristianstad University has pursued gender equality work in research funding. It has managed to promote equality, for example by cutting the time for research by half for professors, associate professors and senior lecturers, which has contributed to a more equal distribution of the university's research resources. The KTH Royal Institute of Technology has sought to make the gender equality perspective part of all planning and actions. It has also established an Equality Office. To promote equality, the Office has provided education on equality perspectives (Jämställdhetsmyndigeten, 2020).

The Polytechnic University of Catalonia introduced a gender coefficient to promote the proportion of women among its professors. The coefficient automatically adds points to

the score of women candidates. The coefficient has had significant positive impact on the recruitment of women, and it has been made a permanent practice at the institution.

8 Recommendations for promoting gender equality, non-discrimination and diversity in higher education institutions

Based on the study, the KOTAMO project has drawn up recommendations for higher education institutions, funding organisations and national operators to help them address problems related to gender equality, non-discrimination and diversity. The recommendations are based on the ideas generated jointly with the staff of higher education institutions and funders in the project co-creation workshops and the work of the consortium. The best practices of the reference countries have been used for support in this work (see Appendix 2.) The recommendations have also been discussed with the project's scientific advisory panel.

The gender equality and non-discrimination plan is a key document guiding gender equality and non-discrimination work in higher education institutions, and one that each higher education institution is required to draw up under Finnish law. Nevertheless, many shortcomings have been identified in the preparation process, content, implementation and monitoring of the plans, and considerable differences exist between higher education institutions in this respect. Other key problems identified in higher education institutions include non-transparency of recruitment, implicit discrimination, exclusionary work culture and shortcomings in the availability and utilisation of information about equality and diversity. These problems can be solved by increasing the importance of gender equality and non-discrimination plans and by including the staff and students of higher education institutions more closely into their preparation and monitoring.

Increasing the importance of gender equality and non-discrimination plans: Higher education institutions draw up their own gender equality and non-discrimination plans, as required by law. As part of the gender equality plan, higher education institutions must also survey pay gender disparities. However, large gaps have been found in the preparation, implementation and monitoring of the plans. When preparing the plans, the entire staff should be involved more extensively, and data and research results concerning the state of gender equality and non-discrimination should be used. The Ministry of Education and Culture collects a great deal of information about students and staff from higher education institutions into the Vipunen database, but the database is not utilised systematically. Little research has been conducted about practices of higher education institutions that produce gender inequality and even less about those producing ethnic

inequality. What is more, responsibility for the promotion of gender equality and non-discrimination is often delegated to individual employees and separated from other processes (such as recruitment). Higher education institutions also do not have adequate nationwide support for their gender equality and non-discrimination work.

Non-transparency of recruitment: Higher education institutions currently have varied recruitment practices. Especially the recruitment processes on the lower career levels are experienced as opaque. The vacancies are not always announced openly, and the selection criteria are often found to be unclear. Opaque recruitment processes raised doubts about the recruiter favouring their circle of acquaintances at the expense of equal employment opportunities.

Implicit discrimination and non-inclusive work culture: The teaching and research staff come across various types of discrimination in their work community, but it can often be difficult to identify, report and address discrimination. Such forms of implicit discrimination contribute to career segregation and influence people's wellbeing at work just like more obvious forms of discrimination. Moreover, it is also not altogether clear whether the reporting of discrimination or harassment is of more use or harm to the individual. Examples of problematic situations include the recurrence of so-called non-events, small things that fail to materialise, such as not being invited to participate in unofficial networks or research cooperation, or not receiving adequate career-related encouragement and supervision. Implicit discrimination can also show in the linguistic practices of higher education institutions. Even if the language of work in a work community is English, individuals may be sidelined in the community's daily interaction if discussions are conducted in Finnish.

To address these problems, the KOTAMO project recommends the following measures:

Recommendation 1: The Ministry of Education and Culture will convene and fund an independent, cross-sectoral cooperation group to support equality work in higher education institutions.

- The Ministry of Education and Culture will convene and fund a fixed-term, independent and national cross-sectoral cooperation group tasked with supporting and promoting gender equality and ethnic diversity in higher education institutions and the sector at large. The group will be convened and funded by the Ministry of Education and Culture, but it will act independently. The group will comprise representatives of higher education institutions, organisations and other stakeholders, appointed by the organisations themselves. The group will have a secretariat. It will support the equality work of higher education institutions by producing, compiling and disseminating

information about good practices and the latest research results about the state of equality in Finland and other countries, by recommending actions for higher education institutions and by organising seminars and other events to boost equality work. The group's activities will be assessed after five years, at which time a decision on its continuation will be made. The group could be modelled on the Norwegian KIF Committee (further information about the KIF Committee is available in Appendix 2) and the cross-sectoral cooperation of the Ministry of Education and Culture, higher education institutions and other stakeholders aimed at implementing the policies for promoting internationalisation in higher education and research⁷.

Recommendation 2: The Ministry of Education and Culture will regularly monitor the results of equality work carried out in higher education institutions as part of all supervisory activities and agreement negotiations.

- The Ministry of Education and Culture will monitor the equality work carried out by higher education institutions and the related results as part of the supervision of higher education institutions. In addition, the Ministry and higher education institutions will discuss the results of equality work in connection with the agreement negotiations organised every four years. Attention will be paid to how gender equality and non-discrimination challenges have been identified, the amount of resources allocated to gender equality and non-discrimination work, the concrete measures adopted to promote gender equality and non-discrimination, as well as the results achieved. As part of the negotiations, the Ministry will raise matters related to equality work that higher education institutions must address.

Recommendation 3: The Ministry of Education and Culture will study the possibility of establishing an accreditation scheme promoting equality

- The Ministry of Education and Culture will support the equality work of higher education institutions by determining, in cooperation with higher education institutions, how the Athena SWAN accreditation would work in Finland. Athena SWAN Charter is an accreditation scheme for promoting equality in higher education institutions and research institutes. It is a three-tier scheme, in which higher education institutions are granted an award depending on how ambitious their equality plans and measures have been and how successfully they have implemented them. The scheme was established in the UK in 2005

7 <https://okm.fi/en/international-strategy-for-higher-education-and-research>

and has since been adopted in several countries. For example, in Ireland, the three main research funders require the certificate from organisations applying for funding. (Read more about Athena SWAN in Appendix 2.)

Recommendation 4: The Finnish Education Evaluation Centre will make the assessment of equality measures a more integral part of its audits of higher education institutions.

- The Finnish Education Evaluation Centre (FINEEC) will make the assessment of equality measures a more integral part of its audits of higher education institutions the next time the audit model is revised. Equality measures will be evaluated as part of the basic audit, and their evaluation will be broader than the current optional equality audit. The competence of FINEEC's staff in gender equality and non-discrimination measures and in the evaluation of their implementation will be supported through regular training.

Recommendation 5: Higher education institutions will determine how information about the equality experienced by the staff can be made part of the leadership's performance-related pay.

- Higher education institutions will systematically collect information about the staff's experiences about equality and diversity and will determine how these indicators can be made part of the performance evaluation and performance-related pay of the leadership and supervisors of higher education institutions. Linking the results of gender equality and non-discrimination work to pay will promote the achievement of results in practice.

Recommendation 6: Higher education institutions will regularly organise gender equality and non-discrimination training for their staff and will require this competence from individuals who participate in recruitment and work in leadership positions.

- Higher education institutions will integrate gender equality and non-discrimination training into their orientation, staff and leadership training. This type of training will become mandatory after a transition period and will be repeated regularly, for example once a year. Regular training on these topics will help the staff maintain their competence up-to-date on gender equality and non-discrimination, which is required for a gender equal and non-discriminating work environment.
- Higher education institutions will require those participating in recruitment to complete training dealing with gender equality, non-discrimination and diversity in recruitment processes before participating in recruitment. The

working group in charge of recruitment cannot convene until most of its members have completed such training. This type of training ensures that the majority of people participating in recruitment know how to avoid different types of discrimination throughout the recruitment process.

- After the transition period, higher education institutions will make gender equality and non-discrimination competence a mandatory competence requirement for people recruited for leadership positions and a merit for people hired for other duties. By defining gender equality and non-discrimination competence as a mandatory competence requirement, the organisation communicates its commitment to gender equality and non-discrimination work and promotes its implementation in practice.

Recommendation 7: Higher education institutions will provide information about their gender equality and non-discrimination plans and their implementation more efficiently and visibly.

- Higher education institutions will annually monitor the implementation of their gender equality and non-discrimination plans and communicate the results to staff, students and funders. The results will be discussed at special events with the staff. The monitoring results will be published openly on the higher education institution's website. The open and regular communication about results will improve the stakeholders' awareness of the higher education institutions' gender equality and non-discrimination work and improve the stakeholders' chances of participating and following gender equality and non-discrimination work in different contexts.
- Higher education institutions will include in their equality plans measures for preventing harassment and inappropriate treatment, as well as guidelines for victims of harassment or inappropriate treatment. Higher education institutions collect and regularly publish information about the observed types of harassment and inappropriate treatment, as well as the measures adopted to deal with these. Harassment and inappropriate treatment in social media will also be addressed in the guidelines. Communicating about measures and guidelines strengthens people's confidence in the employer reacting appropriately to reported harassment.

Recommendation 8: Higher education institutions will draw up daily rules for an inclusive work culture. The rules will be actively communicated within higher education institutions, and staff will receive training in an inclusive work culture.

- Finnish higher education institutions will cooperate with their staff to compile principles and practical measures for supporting an inclusive work culture in

higher education institutions. These principles and measures will be actively communicated in the day-to-day operations of higher education institutions.⁸ The guidelines will help make everyone aware of their rights and obligations as members of an inclusive work community.

- The daily rules of an inclusive work culture include practices related to both formal and informal situations, such as instructions on language use and how to intervene in inappropriate treatment. The instructions are made available in three languages.
- Higher education institutions offer their staff training to help them identify implicit discrimination and intervene in inappropriate behaviour. By rehearsing situations during training, participants can better prepare for challenging situations.

Recommendation 9: The employer and employee organisations in the field of higher education will launch two joint projects, in which higher education institutions will draw up operating recommendations for equal and non-discriminating recruitment and for the preparation of pay surveys.

- The employer and employee organisations in the field of higher education will launch a project in which they draw up consistent operating recommendations for transparent and non-discriminating recruitment. This will pave the way for more harmonised recruitment practices in different recruitment situations and in the organisation in general.
- The employer and employee organisations in the field of higher education will prepare operating recommendations jointly with higher education institutions on the setup of control groups used in pay surveys and on reporting and communicating about them. This national support will improve the quality of pay surveys, as the way in which control groups are set up is of great importance to the survey results. Too broad a setup is often a problem in surveys.

Recommendation 10: Higher education institutions will clarify their recruitment criteria and communicate the selection criteria more openly.

- Higher education institutions will openly advertise all job vacancies lasting more than six months. Vacancies shorter than this will be advertised openly to the extent possible. Openly advertised vacancies attract various types of applicants and thus support diversity.

⁸ Read more about the University of Helsinki's Kumpula Campus Code of Conduct: <https://www.helsinki.fi/en/faculty-science/faculty/kumpula-campus-code-conduct>

- The manner in which applicants are evaluated and the criteria used will be clearly announced in job advertisements. The weight of different criteria is clearly indicated.
- Higher education institutions will collect feedback on the recruitment process from job applicants, focusing on the perspective of gender equality and non-discrimination. A compilation of feedback will be published openly.

Recommendation 11: Higher education institutions and research funders will emphasise studies on gender and diversity in higher education institutions, as well as the collection of data about these themes.

- The Ministry of Education and Culture will regularly publish reports based on the collected data. Information is already widely collected into the Vipunen database, maintained by the Finnish National Agency for Education. The reports support and inspire equality work in higher education institutions by providing easily readable data about the state of equality and diversity in higher education institutions. The new body supporting equality work (see Recommendation 1) can later assume a role boosting data collection and reporting.
- An evaluation will be made of the state of gender studies in higher education institutions, the funding and coordination of which will be discussed with the Ministry of Education and Culture, Academy of Finland and higher education institutions. Gender studies as a field of science and discipline, as well as research on gender, gender equality and non-discrimination conducted in different fields establish an important knowledge base for equality work in higher education institutions.
- Various foundations and the Academy of Finland will fund research programmes that examine practices in higher education institutions and in research careers that produce gender inequality and ethnic inequality. Foundations will support research dealing with gender equality and non-discrimination in universities and universities of applied sciences, focusing especially on racialisation and racism in Finnish higher education institutions.

Recommendation 12: Parties funding research will document and publish information about the distribution of funding by gender and nationality.

- Foundations granting research funding will determine and publish information detailing the gender distribution of their funding and the distribution among Finns, EU nationals, citizens of EU/EEA countries and citizens of countries outside the EEA.

- The Ministry of Education and Culture will study and report how the research funding of higher education institutions (both core and external funding) is distributed overall among women and men and female- and male-dominated fields.

Recommendation 13: Research funders will allocate some of the funding to the development of an inclusive work environment for research groups.

- In the application budget, Finnish research funders will require other expenses to include funding for measures that support the work community's inclusive work culture. Such measures can include training on unconscious biases and prejudices, elimination and prevention of implicit discrimination, as well as intervention in inappropriate behaviour. This enables research groups and organisations to independently promote an inclusive work culture and their members' competence in the theme. An inclusive work culture supports researchers' wellbeing at work, ability to cooperate, learning and commitment, which in turn are prerequisites for high-quality research and the renewal of science.

Recommendation 14: Interest groups representing teaching and research staff will conduct a survey on the daily language practices in higher education institutions and their impact on non-discrimination among teaching and research staff and the achievement of an inclusive work community.

- Interest groups representing teaching and research staff will conduct a survey about the Finnish field of higher education, examining the everyday linguistic practices in Finnish higher education institutions and the languages used in administration, as well as their impact especially on the equal treatment of teaching and research staff, the opportunities for career advancement and the inclusiveness of the work community. The survey will examine the state of multilingualism in the everyday operations and administration of higher education institutions, identify tensions arising from current linguistic practices, share higher education institutions' good linguistic practices and develop new solutions and recommendations for promoting a multilingual daily environment and administration in higher education institutions.

9 Conclusion

As indicated by the KOTAMO survey, work remains to be done to promote gender equality, non-discrimination and diversity in Finnish higher education institutions. The challenges faced by teaching and research staff are related to both practices and daily interaction in higher education institutions. The KOTAMO project focused on aspects such as recruitment practices, career development and research group activities. According to the project survey and interviews, challenges concerning gender equality are identified quite well, but actions to address them are not systematically taken. Challenges related to ethnic equality are not yet identified quite as well in higher education institutions, but they are clearly exposed in the survey responses concerning discrimination experiences. It is important to further enhance cooperation among higher education institutions in the promotion of equality and diversity. One possible improvement would be to develop multilingual practices to enable both multilingual communication and an easier way to learn the languages needed at work as part of daily activities. Further research is also needed about gender equality, other forms of equality and diversity in higher education institutions. Very limited information about these matters is currently available. Higher education institutions also differ widely in how ambitious they are about promoting gender equality, non-discrimination and diversity. Compared to the reference countries, fewer measures have been taken in Finland to promote equality and diversity, but the recommendations proposed in this report can help close this gap. As equality and diversity become increasingly important questions in society at large, higher education institutions, in their role as educators of future experts, must also take more determined and ambitious action to promote equality and diversity. This is also required by the new generations of students embarking on a higher education career.

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Appendix 1. How this report was drawn up

The KOTAMO project comprised a literature review, a survey for higher education institutions, individual and group interviews with teaching and research staff at different career levels, as well as co-creation workshops involving staff from higher education institutions and funding bodies.

Literature review

The literature review surveyed the realisation of and issues related to gender equality, non-discrimination and diversity among teaching and research staff from an essentially Finnish perspective. The survey was conducted through a keyword search in a few key journals (Gender, Work and Organization; Equality, Diversity and Inclusion; Higher Education; Nordic Journal of Feminist and Gender Research NORA; Työelämän tutkimus) and several databases (Helka, Finna and Google Scholar). The selection of key sources was also determined by the expertise of the project team and based on comments from the scientific advisory panel. The literature review is available in Finnish on the KOTAMO website at <https://okm.fi/kotamo>.

Survey

As part of the KOTAMO project, a survey was conducted to obtain information about the views and experiences of teaching and research staff in higher education institutions concerning the realisation and promotion of gender equality and non-discrimination. The questionnaire and questions were drawn up in cooperation involving the research group and the project steering group to ensure they focused on topics central to the KOTAMO project. The survey was based on tentative observations from the literature review and on the research group's prior experience. The project's scientific advisory panel also commented on the questionnaire. In addition, comments on the draft questionnaire were collected from around 15 test respondents belonging to the target group.

The final version of the questionnaire was drawn up based on all the comments. The questionnaire format and number of questions varied depending on the respondents' background information, and different sections and questions were shown to different groups of respondents. The survey as a whole contained the following sections:

1. Background information related to the respondent and their work

2. Career development
3. Recruitment
4. Doctoral research
5. Work in research groups
6. Non-discrimination in the work community
7. Discrimination and harassment in higher education institutions
8. Practices adopted by higher education institutions to promote gender equality and non-discrimination

The survey was conducted using an anonymous online questionnaire available in Finnish, Swedish and English. The cover letter and link to the questionnaire were sent to the registries of higher education institutions, with the request to distribute them to the teaching and research staff. Information about the survey was also communicated through the project commissioner's and implementor's own networks. For example, the equality and non-discrimination advisers of higher education institutions were contacted and asked to distribute the material in appropriate channels.

The survey was open from 17 February to 21 March 2022. A total of 2,765 responses were received during this period. All the survey results have been published in a separate report available on the KOTAMO website at <https://okm.fi/kotamo>. In this final project report, the results are discussed selectively, focusing on observations that are significant from the project's perspective.

Notes about the survey

The survey sample encompasses a significant proportion of teaching and research staff of Finnish higher education institutions. However, the sample is not representative but weighted in different ways. The large higher education institutions of bigger cities are overrepresented in the number of responses. The University of Helsinki, Aalto University and Tampere University accounted for the largest number of responses. The responses from these universities amounted to 43 per cent of all the survey responses, while the universities' share of all the higher education teaching and research staff is around 36 per cent⁹. In the case of universities of applied sciences, the responses were slightly more balanced, but nevertheless, the two institutions that provided the most responses – the Haaga-Helia and Laurea universities of applied sciences – operate in the metropolitan area. They accounted for nine per cent of all the respondents, compared to their three per

⁹ Calculated as the share of labour units performed by the research and teaching staff of higher education institutions. Source: Vipunen – Education Statistics Finland: University personnel.

cent share of all staff in Finnish universities of applied sciences. Many higher education institutions contributed with very few responses. Less than 15 responses were received from Humak University of Applied Sciences, the University of Lapland, Jamk University of Applied Sciences and Arcada University of Applied Sciences. (Further details are available in Chapter 2.2 of the survey report on the KOTAMO website.)

In the results reporting, special attention was paid to gender disparities, on the one hand, and disparities between ethnic groups, on the other hand. This approach was agreed with the project's commissioner. However, when analysing these disparities, it bears keeping in mind that these respondent groups differ from one another in other respects, as well. These differences are discussed in greater detail in the separate survey report, in the section on background questions (chapters 2 and 3). As a rule, the weighting largely matches the different groups' distribution across different duties and fields of science in higher education institutions. For example, compared to men, more women are found in social sciences, arts and humanities, as well as in medical and health sciences in universities of applied sciences. The most common field among male respondents, in both universities and universities of applied sciences, is engineering. Moreover, a larger share of female respondents in both universities and universities of applied sciences were on lower career levels compared to male respondents. This also corresponds to the distribution among staff of higher education institutions.

In terms of gender, the proportion of women of all the respondents was slightly higher than their share among all the staff of higher education institutions. Of the respondents working in universities, 57 per cent were women. In contrast, women account for 47 per cent of all the teaching and research staff in Finnish universities¹⁰. Of the respondents representing universities of applied sciences, 69 per cent were women, whereas women account for around 59 per cent of all the teaching and research staff in Finnish universities of applied sciences. Non-binary respondents accounted for less than one per cent of all the respondents. This group is very small, especially when analysed separately for universities and universities of applied sciences. Because of this, they were not included in the review and instead, the report only examines male and female respondents as separate groups. In addition, just under three per cent of the respondents did not want to reveal their gender. They were also excluded from the review based on gender.

Concerning ethnic background, the respondents were asked whether they felt they belonged to an ethnic group that is a minority due to reasons such as race, appearance, culture or religion in Finnish higher education institutions. A total of 355 respondents, that is, around 12 per cent of all the respondents felt they belonged to an ethnic minority.

10 Ibid.

Of them, 60 per cent also said they felt exposed to discrimination because of their ethnic background.

In this report, ethnic background was chosen as a variable to highlight it alongside the more typical variables of nationality and language featured in statistical analyses. However, many other background features are also linked to ethnicity. In the description included with the question on ethnic background, the ethnic majority was determined to be white Finns¹¹. This makes nationality a part of ethnicity. Of the respondents belonging to an ethnic minority, 39 per cent were Finnish citizens or had dual citizenship. However, in the question itself, the respondents were given the choice to determine their ethnicity, and even of those who did not consider themselves to belong to an ethnic minority, seven per cent were non-Finnish citizens. In this report, “ethnic Finns” is nevertheless used as shorthand for the ethnic majority.

Language also played a very significant role in the experiences of ethnic minority representatives. More than three quarters of the respondents belonging to an ethnic minority reported a language other Finnish or Swedish as their native language. Only 27 per cent of the respondents from ethnic minorities mainly used their native language at work, compared to 67 per cent of ethnic Finns. Of the respondents from ethnic minorities, 56 per cent had completed their highest degree in a Finnish higher education institution, compared to more than 92 per cent of ethnic Finns.

Respondents belonging to ethnic minorities differed from ethnic Finnish respondents in some background variables. More than four in every five respondents from ethnic minorities worked in a university. Their gender distribution was also more balanced than that of ethnic Finnish respondents: women accounted for 47 per cent and men for 49 per cent of the respondents. The distribution across different fields of science was quite similar to that of ethnic Finns. Lower career levels were more prominent among ethnic minority respondents working in universities, and this corresponds to the situation among the staff of all higher education institutions, as non-Finnish citizens work more commonly on the lower levels.

A detailed analysis of the impact of all these variables cannot be fully performed in this project. Linkages between ethnicity, language, citizenship and other variables were also found in the background literature and interview materials. Those in the weakest position characteristically exhibit several factors that expose them to discrimination: for

11 In the questionnaire, the questions was formatted as: “Of the staff in higher education institutions, Finnish citizens accounted for 78.1% in 2020. Most of them were ethnically white Finns. Do you feel you belong to an ethnic group that is a minority due to reasons such as race, appearance, culture or religion in Finnish higher education institutions?”

example, women from ethnic minorities, who come from non-EU/EEA countries and work on the lower career levels in higher education institutions. The survey also identified intersectional impacts, where these were detected, but gender and ethnic background were at the focus of the analysis. The review of ethnicity, in particular, is justified, as it has not been studied much in the context of Finnish higher education institutions.

The choice of gender and ethnic background as the variables studied in the survey also gave rise to justified criticism in the open-ended responses, as well as in feedback received through other channels. Criticism focused especially on the exclusion of other factors causing inequality and discrimination from the background variables, such as age, sexual orientation or disability. It is true that the chosen delimitation fails to address many significant forms of inequality. In the first versions of the questionnaire, the respondents' background information was mapped more extensively, but due to privacy considerations, restrictions had to be made to the information collected to ensure the respondents' anonymity was protected as well as possible. The significance of anonymity is emphasised when dealing with sensitive personal data, including ethnicity. Because of this, reporting could not be made for individual higher education institutions, but instead, the respondents are examined on the level of all universities and universities of applied sciences. The higher education institution where the respondent worked was recorded for the purpose of tracking the number of respondents, but it was not linked to any other responses.

Interviews

In addition to the survey, a number of individual and group interviews were conducted to determine the state and key problems of gender equality, non-discrimination and diversity among staff of higher education institutions. The goal of the interviews was to learn more about the staff members' views and personal experiences of the state and realisation of gender equality, non-discrimination and diversity and thus enrich the survey material.

Individual interviews were conducted in two stages: preliminary interviews in autumn 2021 and individual and group interviews in summer 2022. Five preliminary interviews were conducted in autumn 2021 with participants who were responsible for gender equality and non-discrimination matters at three universities of applied sciences and two universities. The goal of these interviews was to provide a background for the project and collect important information for the survey on themes such as the state of gender equality and non-discrimination in higher education institutions, current challenges, the implementation of statutory gender equality and non-discrimination plans, and the need for information of people working with gender equality and non-discrimination matters. The interviews were conducted as individual interviews, but one of them included three representatives of the higher education institution.

To limit the number of interviewees, around five higher education institutions in different geographic areas were selected, and people whose job description included the promotion of gender equality and non-discrimination matters in their higher education institution were contacted. Since many of the institutions did not have an actual gender equality adviser, HR managers, heads of administration and members of gender equality and non-discrimination working groups, who felt that gender equality and non-discrimination matters were part of their job description, were selected instead for the interviews. The preliminary interviews were carried out over a video connection, and they lasted for approximately one hour. The interviews were documented by taking notes of the discussion.

The results of the preliminary interviews served as the basis for the individual interviews, which were conducted in February–May 2022. The preliminary interviews offered a better picture of the similarities and differences between universities and universities of applied sciences and helped focus the questions in the survey and individual interviews.

The individual interviews conducted in spring 2022 targeted the teaching and research staff at higher education institutions who mainly represented the academic career III stage (associate professors, both tenure track and non-tenure track, as well as university lecturers) and IV stage (professors and research directors), as well as principal lecturers in universities of applied sciences. A total of 11 individual interviews were conducted. The interviewees were selected using the working group's networks. The diversity of groups was considered when selecting the interviewees. Because of the limited number of interviewees, the results cannot be used to make generalisations. Instead, they help examine the phenomena that came up in the survey and introduce perspectives that could not be addressed in the survey.

The individual interviews were anonymised by categorising the personal data. The goal of anonymisation is to ensure that the interviewees cannot be identified based on the information provided or by combining them with other data. For the purpose of categorisation, the information described in Table 1 was collected from the interviewees after the interviews. The interviewees had the right to refuse to provide some or all of the categorised background information. The individual interviews lasted for approximately one hour. Conducted over a video connection, the individual interviews were recorded for the purpose of analysis.

Table 1. Background information of individual interviewees.

Gender	University of applied sciences/ University	Field of science	Nationality	Belongs to ethnic minority (white Finns as the majority)	Career stage
female	University	Engineering and technology	non-EU/EEA country	yes	II. Postdoctoral
female	University	Social sciences	Finnish	no	IV. Professor/ research director
female	University	Arts and humanities	Finnish	no	III. University lecturer
male	University	Medical and health sciences	EU/EEA country	no	III. University lecturer
female	University	Natural sciences	non-EU/EEA country	no	IV. Professor/ research director
female	University of applied sciences	Social sciences	non-EU/EEA country	no	II. Principal lecturer
female	University	Arts and humanities	Finnish	no	IV. Professor
male	University	Social sciences	EU/EEA country	no	IV. Professor
female	University	Social sciences	Finnish	yes	IV. Professor
female	University	Arts and humanities	Finnish	no	IV. Professor
female	University of applied sciences	Agriculture and forestry	Finnish	no	II. Postdoc/ project researcher (doctorate)/ university teacher & principal lecturer

The goal of the group interviews was to collect experiences of gender equality, non-discrimination and diversity from higher education staff on the lower career levels. Five group interviews were organised, and a total of 17 people took part in them. Twelver of the interviewees did not speak Finnish as their native language. The group interviews targeted people on the lower career levels – doctoral students and project researchers in universities and researchers, lecturers and hourly-paid teachers in universities of

applied sciences. Three of the group interviews were conducted with university staff, who numbered nine and came from six different universities across Finland. Two interviews were organised for staff of universities of applied sciences. They were attended by a total of eight participants from five different universities of applied sciences across Finland.

The interviews were conducted in accordance with the thematic outline. The interview themes were:

- Gender equality, non-discrimination and diversity in general at the interviewee's higher education institution
- Personal experiences related to gender equality, non-discrimination and diversity
- Recruitment
- Career development and pay
- Research funding
- Any recommended solutions to problems concerning gender equality, non-discrimination and diversity

Co-creation workshops

A series of three co-creation workshops was organised during the project. The goal of the co-creation workshops was to validate and further develop the observations and recommendations of and good practices identified in earlier project stages for promoting gender equality, non-discrimination and diversity in Finnish higher education institutions together with the institutions, funding bodies and organisations in the field. The co-creation workshops also aimed to strengthen these stakeholders' ownership of the project and its implementation and support the deployment of measures after the project's completion.

The co-creation workshops followed a similar structure: first, the project and its key results were presented and then, the participants began developing solutions for the challenges identified in the interviews, survey and literature review carried out in the project so far. The event finished with a presentation of the co-creation workshop results and comments from the Ministry of Education and Culture and Academy of Finland.

The first co-creation workshop was organised on 30 March 2022 in the facilities of Tampere University. The second workshop was organised remotely on 21 April 2022, and it was held in Finnish and English. The third workshop was organised on 12 May 2022 in Helsinki, at the Government conference centre. Each event lasted for three hours. Invitations to the events were sent as follows: Invitations to the remote event were sent to all the survey respondents who had given their consent to receiving information about the project.

Information about all the co-creation workshops was sent to the gender equality and non-discrimination advisers (or people holding a similar title) and vice-rectors of higher education institutions. Invitations to the third co-creation workshop were also sent to the higher education institutions' registries. In the invitations, the participants were asked to indicate whether they wanted to participate in the event in Finnish or English. This information was used to determine the main language of the event and to form groups so that everyone could participate in their chosen language.

The three co-creation workshops drew around 80 participants, who represented universities of applied sciences, universities and research funders. They included HR experts and HR directors, lecturers, professors, representatives of foundations, researchers and vice-rectors.

International survey on the best operating models

The international review aimed to collect information about ways in which the reference countries had successfully promoted gender equality, non-discrimination and diversity among the staff at higher education institutions. The choice of the four reference countries – Sweden, Norway, Spain and Ireland – was motivated by the countries offering interesting practices and measures for promoting gender equality and non-discrimination. The countries' social systems are comparable to that of Finland, and their traditional research and higher education systems are another unifying element.

Two measures were selected from each country. The goal was to choose measures and practices from different levels (national, funding body, higher education institution), as well as measures that promote both diversity and equality.

The countries' national measures for promoting gender equality, non-discrimination and diversity in higher education institutions were examined based on documentary analyses, statistical analyses, research literature and semi-structured expert interviews.

In all eight interviews were conducted (1–2 interviews per measure) with interviewees who had an operational role in the implementation of the selected measures and practices. The interviews were conducted in December 2021 and January 2022. The interviews lasted for approximately one hour and were conducted over a video connection.

Scientific advisory panel

The task of the KOTAMO project's scientific advisory panel was to support the survey by introducing different perspectives, relevant sources and contacts. The panel members

have diverse legal and social scientific expertise in gender equality, non-discrimination, diversity, academic organisations and research careers. The panel convened three times during the project to discuss the project's results. The panel members included the following:

Niklas Bruun: Professor emeritus in commercial law at Hanken and a leading expert in gender equality legislation in Finland, member of the UN CEDAW Committee in 2009–2016, expert member of the government's working group appointed to prepare a report on gender equality policy, member of the Board of the University of Helsinki 2022–2025.

Anne Holli: Professor of political science at the University of Helsinki, studied the significance of gender and the realisation of gender equality in political participation and political representation, as well as the realisation of democracy in Finnish political institutions.

Johanna Kantola: Professor of gender studies at the Tampere University, whose ERC project (2018–2023) "Gender, party politics and democracy in Europe: A study of European Parliament's party groups" (EUGenDem) studies gender, party politics and democracy in Europe and the EU.

Oili-Helena Ylijoki: Senior research fellow at the Research Centre for Knowledge, Science, Technology and Innovation Studies (TaSTI), docent in social psychology (Tuni). Has studied changes in production, academic work, research careers and gendered structures and practices in universities. Involved in the Nordic Centre of Excellence on Women in Technology Driven Careers (Nordwit) and in Tampere University's project called Changing University Institution and Equalities in Academic Work.

David Hoffman: Docent (University of Jyväskylä), the most senior researcher with a migrant background in the Finnish Institute of Educational Research (FIER). Has helped set up the Migration, Mobilities and Internationalization (miNET) research group that examines the challenges related to gender equality, non-discrimination and diversity in the Finnish higher education system.

Appendix 2. Summary of the comparison of the best international operating models

1 Good international practices

Measures for the case studies were selected from Sweden, Norway, Spain and Ireland. Of the countries chosen, Sweden and Norway have long worked to improve gender equality in science and higher education institutions. Spain and Ireland do not have as long an experience in promoting equality among staff, but in recent years, both countries have adopted significant measures in this respect, and especially gender equality between men and women has received a great deal of attention.

Two measures were selected from each country. The goal was to choose measures and practices from different levels (national, funding body, higher education institution), as well as measures that promote both diversity and equality.

More detailed descriptions are available on the website of the KOTAMO project at <https://okm.fi/kotamo>.

1.1 National measures

1.1.1 Athena SWAN (Ireland)

Athena SWAN is an accreditation scheme for promoting equality in higher education institutions and research institutes. Developed in the UK in 2005, the scheme has since been adopted in many countries. It was launched in Ireland in 2015. The scheme is also in use in the US and Australia.¹² Ireland's Higher Education Authority is responsible for Athena Swan, which receives funding from the Department (Ministry) of Further and Higher Education, Research, Innovation and Science.¹³

When Athena SWAN was launched, the overall aim was to increase the number of women among the academic staff in Irish higher education institutes and specifically the number

¹² Advance HE (n.d), International Charters, <https://www.advance-he.ac.uk/equality-charters/international-charters>.

¹³ Higher Education Authority (n.d.) Athena Swan, <https://hea.ie/policy/gender/athena-swan/>.

of female professors within the STEMM disciplines. In 2016, the goals were extended to encompass fields outside engineering and technology. Instead of focusing on academic staff alone, Athena SWAN focuses on all personnel groups in higher education institutions as of 2016. The third change came from an emphasis on intersectionality: for example, personnel with a trans-background, ethnic diversity and the underrepresentation of men in particular disciplines have been part of the Athena SWAN accreditation since 2016.¹⁴

The charter consists of three different awards: Bronze, Silver and Gold. Accreditation can be sought by individual departments and institutions or by the entire higher education institution. A Bronze award is granted to applicants that have assessed their gender equality and related challenges and have a 4-year action plan to address the challenges. A Silver award can be granted to applicants that have successfully implemented the proposed action plan and can demonstrate its measurable impact. A Gold award recognises beacons of achievement in gender equality, whose measures promoting gender equality serve as good examples to other higher education institutions.¹⁵

The Athena SWAN accreditation scheme has become an important part of the equality work carried out by Ireland's higher education institutions. What has further emphasised the scheme's importance is that the country's three main research funders now require the certificate from organisations applying for funding.¹⁶

1.1.2 KIF Committee (Norway)

The KIF Committee (Komité for kjønnsbalanse og mangfold i forskning) is appointed by the Norwegian government, with the goal of promoting gender equality and diversity in the STEM disciplines.

The Committee aims to mainstream viewpoints and processes related to gender equality and ethnic diversity. The Norwegian Government appointed the first Committee in 2004. The Committee supports gender equality efforts in higher education institutions and makes recommendations to higher education institutions. Originally focused on gender equality, the committee's mandate expanded in 2014, when questions related to ethnic diversity were added to it.¹⁷

14 Higher Education Authority (2019). HEA Statement on Athena SWAN Charter in Ireland.

15 Higher Education Authority (n.d.). "[Athena SWAN Charter](#)".

16 Interview with a representative of Innovation & Engagement at the Technological HEA, December 2021.

17 Interview with a representative of the KIF Committee, December 2021.

The Ministry of Education and Research appoints the Committee for three years at a time. The Committee also reports to the Ministry. It comprises representatives of higher education institutions and different stakeholders. It also has a secretariat in charge of administrative tasks. The following discussion focuses on the Committee's latest mandate period from 2018 to 2021. The operations continue, and a new Committee has been appointed for the period 2022–2025.¹⁸

In 2018–2021, the KIF Committee supported the promotion of gender equality and diversity in the following ways:

- Advice/guidance: KIF is an advisory body that supports higher education and research institutions. It can be contacted by higher education institutions, research institutes and individual researchers. The Committee also receives requests for statements for various projects and processes related to gender equality and diversity.
- Conferences and seminars: The KIF Committee organises seminars on diversity and gender equality in higher education institution.
- Communication: Through its website, the Committee conveys current news and information about its operations and about research on gender equality and diversity.
- Visits to higher education institutions and other research institutes: The KIF Committee regularly visits higher education institutions. During these visits, the Committee meets the management of institutions to discuss their work with gender balance and diversity. The KIF Committee is not a supervisory authority, the purpose of the visits is only to provide support and advice.
- Management training: The KIF Committee aims to influence existing leadership development programmes to make themes related to gender, ethnic diversity and sexual harassment a more integral part of the programmes.
- Knowledge development: KIF commissions and produces reports and surveys focusing on gender equality and diversity in higher education institutions.
- International cooperation: The KIF Committee participates in Nordic and European networks focusing on gender equality and diversity issues.¹⁹

18 Kifinfo (2022) Mandat for Komité for kjønnsbalanse og mangfold i forskning (Kif), <https://kifinfo.no/nb/content/komiteens-mandat>.

19 Agenda Kaupang (2021). Evaluering av Komité for kjønnsbalanse og mangfold i Forskning, https://kifinfo.no/sites/default/files/rapport_evaluering_av_kif_0.pdf.

The KIF Committee is an important operator in Norway, and thanks to its work, questions related to the gender equality and diversity of staff in higher education institutions are prominent in the higher education sector and society. The Committee appointed by the Ministry of Education and Research places importance on the diversity and equality efforts of higher education institutions. However the effectiveness of the Committee's work has not been assessed.²⁰

Questions related to ethnic diversity are key challenges for KIF. Although the promotion of diversity has been included in the Committee's mandate since 2014, the theme has been found to be more challenging than the promotion of gender equality. The definition of diversity is a key challenge, as is the fact that in higher education institutions, the people responsible for gender equality are often also responsible for diversity. The lack of employees solely responsible for diversity often leads to diversity questions ending up lower on the agenda in higher education institutions, making the work of the KIF Committee more difficult.²¹

1.1.3 Women, Science and Innovation Observatory (Spain)

In 2019, the Spanish government approved the creation of the Women, Science and Innovation Observatory (Observatorio Mujeres, Ciencia e Innovación) (OMCI) . The initiative came from the Ministry for Science and Innovation. The OMCI is an inter-ministerial body.

The OMCI is a permanent body with the following tasks:

- Oversee the measures of ministries, other administration and academia from the perspective of gender equality in science.
- Promote measures for preventing sexual harassment and violence against women in higher education institutions.
- Determine the impact of new legislation, projects and measures on gender equality in science.
- Propose new measures for promoting gender equality in science.
- Analyse the development of gender equality in science.²²

²⁰ Interview with a representative of the KIF Committee, December 2021.

²¹ Ibid.

²² The Women, Science and Innovation Observatory, 2022, [Observatorio Mujeres, Ciencia e Innovación](#).

The OMCI consists of an expert group and a commission. The expert group comprises 120 representatives of the third sector and research organisations, divided into 11 thematic groups. Each group has been set up to ensure as broad a representation as possible of different sectors, regions, ages and genders. The expert groups can develop ideas, projects and measures and propose them to the commission.²³

The commission comprises representatives of the government and the third sector. They meet three to four times a year. The commission's key task is to support the expert groups and prepare suggestions for the plenary.²⁴

The plenary makes the strategic decisions and meets twice a year. It includes 22 representatives from different ministries and one research organisation.

The OMCI does not have an administrative secretariat, but plans are to establish one.²⁵

The OMCI's activities have not yet been evaluated. According to its representatives, the OMCI's establishment has nevertheless made a significant difference. It has helped put gender equality in science high on the political agenda in Spain, and the OMCI thus creates a significant potential for change. According to a representative of the OMCI, it is important that different ministries, research organisations and the third sector are also represented in the Observatory. Different perspectives ensure the OMCI's members have a good idea of the kind of measures that are really needed. Securing adequate resources has been a challenge.²⁶

1.1.4 BALANSE programme (Norway)

In 2012, the Research Council of Norway launched a ten-year Programme on Gender Balance in Senior Positions and Research Management (Kjønnbalanse i toppstillinger og forskningsledelse). The programme goes by the name BALANSE.

23 Interview with a representative of Women, Science and Innovation Observatory (OMCI), February 2022.

24 Ibid.

25 Ibid.

26 Ibid.

The aim of BALANSE is to improve gender equality in Norwegian research. One of the key goals is to increase the number of women in professorships and academic leadership positions.²⁷

The BALANSE programme finances projects that aim to improve gender equality in individual higher education institutions and other research institutes. The parties applying for BALANSE funding are themselves responsible for surveying their challenges related to gender equality and planning measures to address them. BALANSE funding can only be granted to projects that are part of the institutions' own strategic gender equality efforts.²⁸

In addition to providing funding, BALANSE serves as a platform for networking and disseminating information about gender equality in science. Meetings and networking events related to various themes are also organised within the BALANSE programme.

The programme is funded by the Norwegian Ministry of Education and Research. The budget for the programme period 2012–2022 is estimated at approximately EUR 16 million.²⁹

The BALANSE programme has a steering committee responsible for ensuring that the strategic objectives are met. It consists mainly of representatives of Norwegian higher education institutes and other research organisations. In addition, the programme's two employees handle administrative tasks.

The BALANSE programme has played a significant role in increasing the visibility of gender equality questions. It provides concrete support to the gender equality efforts of higher education institutions. According to the programme coordinator, one of the crucial factors is that the higher education institutions and research organisations themselves survey bottlenecks and challenges related to gender equality and plan the measures for removing them. BALANSE provides funding, support and the conditions for funding, but the funding recipients have free hands in other respects.³⁰

27 Forskningsrådet (2017) Work programme 2017–2022: Programme on Gender Balance in Senior Positions and Research Management (BALANSE), <https://www.forskingsradet.no/siteassets/sok-om-finansiering/programplaner/balanse-work-programme.pdf>.

28 Ibid.

29 Ibid.

30 Interview with a representative of the BALANSE programme, January 2022.

1.2 Measures of funding bodies

1.2.1 Science Foundation Ireland

Established in 2000, Science Foundation Ireland (SFI) is a state-funded organisation that provides research funding in Ireland.³¹

SFI has an active role in promoting gender balance in research in Ireland, especially in the STEM disciplines. SFI aims at removing any obstacles that may limit the career paths of women in male-dominated STEM careers.

Since 2015, SFI has carried out several measures to promote gender equality in science. These include:

- Changes promoting gender equality in the SFI Starting Investor Research Grant Programme: in 2015, the process was changed so that instead of six candidates (the allowed number per research organisation), research organisations were allowed to nominate 12 candidates of whom no more than six could be men. The applications were treated equally without gender weighting. This raised the proportion of female applicants from 25 per cent (2013) to 48 per cent (2018), and in 2018, women received 41 per cent of the funding.
- In 2016, SFI launched the SFI Gender Strategy for 2016–2020. The strategy provides a framework for SFI's gender equality efforts. Initially, SFI set as its target that women should account for 25 per cent of the funding recipients. This target was reached in 2017, so it was revised upwards to 30 per cent.
- In 2019, SFI made changes to the SFI Frontiers for the Future Programme to promote gender equality. The eligibility criteria were modified, for example by reducing the required number of publications in the application documents. SFI also hired an expert to review the language of the applications. The applications were treated equally without gender weighting, but if a male and female applicant received the same final score, priority was given to the female candidate. Prior to these changes, women received 21 per cent of the funding. After the changes, this figure was 45 per cent.
- In 2019, SFI introduced parental leave for researchers receiving funding from SFI.³²

31 Science Foundation Ireland, <https://www.sfi.ie/>.

32 Fritch, McIntosh, Stokes & Boland (2019). Practitioners' perspectives: a funder's experience of addressing gender balance in its portfolio of awards, <https://www.tandfonline.com/doi/pdf/10.1080/03080188.2019.1603882>

SFI's active gender equality efforts have played a significant role in improving the gender balance of Irish science. The Gender Strategy has provided an important framework for SFI's work and brought funders, higher education institutions and other research institutes around the same table to discuss the gender balance in science.³³

1.3 Measures of higher education institutions

1.3.1 Kristianstad University redistribution of funding (Sweden)

In 2016–2019, Kristianstad University carried out a reform aimed at improving the university's finances, which also had a significant impact on the more equal distribution of research funding.

In 2016, Kristianstad University faced financial difficulties and a great need to make its operations more efficient. The university carried out three changes, the primary goal of which was to get its finances in order. However, the measures also had a significant impact from the perspective of gender equality. These changes were:

- In 2016, Kristianstad University cut the time available for research for professors, associate professors and senior lecturers by half. This made the distribution of the university's research resources much more equal: men's proportion of research funding dropped from 70 per cent to 65 per cent.
- In 2017, the university introduced "performance-based time" as a new basis for distributing the research time included in the position. This meant distributing research time based on the achievements made in the previous years. This also had a significant impact on resource distribution – after the change, research time was distributed equally among women and men.
- In 2018, Kristianstad University introduced a model for distributing research funding in which a comparison was made between the researchers' achievements and the research time available to them. The goal was to prioritise researchers who are efficient and produce high-quality research. As a result of this change, women accounted for 54 per cent and men for 46 per cent of research funding.³⁴

33 Interview with a representative of SFI's Policy Scientific Programme, December 2021

34 Swedish Gender Equality Agency, *Jämställdhet i Akademin*, 2020, 2020:6, p. 40.
<https://jamstalldhetsmyndigheten.se/aktuellt/publikationer/jamstallldhet-i-akademin-2020-6/>

At the time, Kristianstad University was also given the task by the Government to draw up a gender mainstreaming plan as part of the Government's national measure, Gender Mainstreaming in Higher Education Institutes and Universities, targeting public higher education institutions. The gender mainstreaming plan shed further light on the unequal distribution of resources, and Kristianstad University set itself the goal to gender balance research funding.³⁵

The financial cuts provided the university with resources which it decided to allocate to developing the career paths of academic staff. The university first introduced a change in the system of merits for its academic staff. The system was reviewed from a gender perspective, and the results showed that research merits (publications, supervision of doctoral students and external funding) were valued considerably higher than teaching and academic collaboration. The process was changed to place more emphasis on collaboration.³⁶

In addition, Kristianstad University introduced a programme to provide academic staff with career advice, mentoring and writing support, as well as workshops on how to apply for external research funding.³⁷

Gender equality has improved considerably in Kristianstad University in recent years. In 2019, 60 per cent of the university's internal research resources were allocated to women and 40 per cent to men. The strategic investments in merits have contributed to the increase in the proportion of women professors from 27 per cent (2016) to 39 per cent (2019).³⁸

Kristianstad University is a good example of how the application of a gender perspective in the wider planning of operations can shed light on practices that maintain inequality.

1.3.2 Equality Office of the KTH Royal Institute of Technology (Sweden)

As part of the Government's gender mainstreaming measure, KTH Royal Institute of Technology was also tasked with adopting a gender perspective in all its planning and operations. As is typical of institutes of technology, KTH had a smaller proportion of

35 Interview with a representative of Kristianstad University (January 2022).

36 Swedish Gender Equality Agency, *Jämställdhet i Akademin*, 2020, 2020:6, p. 40. <https://jamstalldhetsmyndigheten.se/aktuellt/publikationer/jamstalldhet-i-akademin-2020-6/>

37 Ibid.

38 Ibid.

women among its teaching and research staff than multidisciplinary higher education institutions. In 2016, only one third of the staff at KTH were women. The proportion of women professors was 15 per cent and that of women lecturers 20 per cent.³⁹ KTH also had a strong feeling of gender equality not being realised.

In 2017, KTH decided to establish an Equality Office. It comprises two DEI strategists, one project leader, the director and one expert. KTH has five faculties. A DEI manager and a supporting group were appointed for each of them. The Equality Office has also received support from experts specialised in change management.⁴⁰

The KTH Equality Office has carried out several projects promoting gender equality, such as:

- Training in the gender perspective, especially for staff members in leadership positions. In 2017, a networking and change management programme was introduced for women leaders.
- Training related to recruitment, focusing on themes such as prejudices, offered to recruiters.⁴¹

According to KTH, the establishment of the Equality Office has led to a greater awareness of gender equality work and its importance in the organisation. The Equality Office has also provided the necessary framework and routines for equality work.⁴² The effectiveness of the measures has not yet been assessed. In 2021, women accounted for 19 per cent of the professors (including visiting professors). Of lecturers, 25 per cent were women.⁴³

1.3.3 Coefficient to promote the recruitment of women at the Polytechnic University of Catalonia

In 2016, the Polytechnic University of Catalonia (Universitat Politècnica de Catalunya (UPC)) introduced a gender coefficient with the aim to promote the recruitment of women as professors. Similar to many other higher education institutions in the fields of engineering and technology, the Polytechnic University of Catalonia has had a

39 KTH (2016) Årsredovisning 2016.

40 Interview with a representative of KTH, January 2022.

41 Interview with a representative of KTH, January 2022.

42 Ibid.

43 KTH (2022) Årsredovisning 2021.

low proportion of women among its professorship – in 2016, only 8.6 per cent of the professors were women.⁴⁴

In 2016, to increase the proportion of women professors, the vice-rector of the UPC decided that the selection of professors should be changed so that the score of female candidates in the qualifications evaluation would be automatically multiplied by a gender coefficient. In 2017, this coefficient was 1.15, and it was raised to 1.21 in 2018 and then to 1.25 in 2021.⁴⁵

The impact of the coefficient is clearly noticeable: in 2021, women accounted for 15 per cent of professors. In 2010, the corresponding figure was 5 per cent, and in 2016, 8.6 per cent. Since 2016, the Polytechnic University of Catalonia has granted 50 full professorships, of which 20 for women and 30 for men. Without the gender coefficient, only six women would have been granted professorship. The gender coefficient is now a permanent measure of the UPC's recruitment practices.⁴⁶

According to the UPC's representative, the gender coefficient has met with some resistance, but the UPC also feels that it is a concrete measure that helps efficiently increase the number of women professors. The fact that the initiative came from the UPC's leadership was extremely important and a clear indication that the leadership is committed to the use of the coefficient.⁴⁷

44 Interview with a representative of the Polytechnic University of Catalonia, February 2022.

45 Ibid.

46 Ibid.

47 Ibid.

2 Summary of the international comparison

The measures described in this section are examples of the great variety of ways to promote gender equality and diversity in higher education institutions and science. The Women, Science and Innovation Observatory in Spain and the KIF Committee in Norway are examples of national level measures that effectively contribute to making diversity and gender equality more visible in the higher education sector and society. A large group of the higher education institutions' representatives and other stakeholders take part in both the Observatory's and the Committee's operations. Thanks to this, the measures have a strong, direct link to the daily operations of the higher education institutions and a multidisciplinary perspective on gender equality questions. According to the representatives of both the KIF Committee and the Women, Science and Innovation Observatory, these measures send a strong signal of the importance of prioritising gender balance in science.

The gender coefficient introduced at the Polytechnic University of Catalonia and the reallocation of resources in Kristianstad are examples of measures that probably do not have a direct impact on the institutions' culture but that have helped obtain results quickly. The gender coefficient helped efficiently raise the number of women professors, and as the "side effect" of the measures that were adopted in Kristianstad to deal with the institution's financial difficulties, the resource allocation became notably more gender balanced.

Representing funding-level measures in Ireland, SFI's gender equality work is an interesting example of the great power of research funding providers and how these bodies can very concretely promote diversity and gender equality. Small changes, such as an increase in the number of funding applicants, has produced significant results. The decision made by Irish providers of research funding to require the Athena Swan accreditation is another example of ways in which funding bodies can concretely promote diversity and gender equality among researchers.

The selected measures are heavily focused on the promotion of gender equality. Even though the KIF Committee and Athena Swan have broadened the scope of measures to address intersectionality, equality between women and men is still at the core of the measures. At least based on this survey, measures focused on diversity have not been introduced to a great extent but instead, equality work in higher education institutions characteristically focuses heavily on equality between men and women.

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(Summary of the comparison of the best international operating models)

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