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Unit 7: Literature Review

What is the gender pay gap in the technology sector in Germany?

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#### Introduction:

## **Definition:**

The gender pay gap is defined as the difference between the average gross earnings of women and men. This difference is given as a percentage of the average gross earnings of men (Statistische Bundesamt, 2022).

## Big picture and importance of the topic:

While at the Fourth UN World Conference on Women in 1995 a resolution was passed by 189 states, including Germany, in which the states committed themselves to promoting gender equality in all areas of society, wage differences between women and men are still being observed worldwide today (Deutscher Bundestag, 2016).

Although the Federal Republic of Germany is trying to eliminate the gender pay gap through various measures such as the minimum wage, the law to promote transparency in the pay structure and the law on equal participation of women and men in management positions, Germany is in fifth place among the countries with the largest gender pay gap in Europe (Bundesministerium für Familie, Senioren, Frauen und Jugend, 2022; Beckert, 2020; Eurostat, 2022). This brings the question into focus of which reasons and factors lead to the gender pay gap in Germany and to what extent these can be found in the technology sector.

## Main body:

## Overview:

- Unadjusted gender pay gap Germany: 2020 18.3%; UK 18.4%; European Union 13.0% (Eurostat, 2022).
- While in most cases the gender pay gap is to the detriment of women, women in managerial positions, as well as in the automotive, aerospace and naval engineering sector earn more than men (EY, 2022; Zucco, 2020).
- On average, men in the German technology sector earn almost 15,000 Euros more per year than women and the unadjusted gender pay gap is with 25% above the German average (Kingham, 2018).
- Comparison to United Kingdom: 78% of large organizations have a gender pay gap in the technology sector, 14% have a median pay gap for women and 8% have no gender pay gap at all (Women in Tech, 2019).
- Differentiation unadjusted and adjusted gender pay gap (Statistische Bundesamt, 2022)

#### Explaining factors of the unadjusted gender pay gap:

- Factors of the wage gap in the technology sector:
- → Family-related career breaks (child penalty) lead to an increase in the gender pay gap with age (Kleven et al., 2019). The study by Goldin et al., 2017 on the gender pay gap shows that the wage gap increased from 3% at job entry to 32.1% within the following 14 years. Starting a family is to be found in this phase of life (Schrenker & Wrohlich, 2022). Regional differences in the gender pay gap support this assumption (Fuchs et al., 2019).

- → Disproportionate pay for long hours in the technology sector (Zucco, 2019), 47% of all employed women on a part-time basis compared to 11% of men (Federal Ministry for Family Affairs, Senior Citizens, Women and Youth, 2022). This assumption is confirmed by the increase in the average hourly wage from EUR 13 for 15 hours a week to EUR 27 for more than 25 hours a week (Zucco, 2020).
- 76% of the unadjusted gender pay gap in the technology sector can be explained by the factors mentioned, the remaining 24%, which make up a net gender pay gap of 6% can be attributed to other causes that have not been taken into account (Zucco, 2020).

#### Missing aspects and explanations

- While this comparative adjusted gender pay gap cannot currently be adequately explained, the adjusted gender pay gap is to be understood as the upper limit for merit discrimination (Statistische Bundesamt, 2022).
- Other factors may include: under-representation of women in managerial positions (Holst & Marquardt, 2018; Arulampalam et al., 2007; Hirsch, 2013; Topalova et al., 2016), salary negotiation strategies of women (Kulik & Olekalns, 2012; Bowles et al., 2007) and Societal perception of men as breadwinners (Lang & Groß, 2020).
- These factors must be examined in more depth in further studies.

#### Conclusion:

 The technology sector is located in the private sector where wages are negotiated.

- Unadjusted gender pay gap in technology sector 25%.
- Taking into account the factors adjusted gender pay gap 6%.
- Central factors: child penalty and disproportionate remuneration for long working hours.
- Adjusted gender per pay gap is to be understood as the upper limit of earnings discrimination.
- Further research on factors of the gender pay gap is necessary.

#### References:

Arulampalam, W., Booth, A. L., & Bryan, M. L. (2007) Is There a Glass Ceiling over Europe? Exploring the Gender Pay Gap across the Wage Distribution. *Industrial and Labor Relations Review* 60(2): 163–186. Available from: https://doi.org/10.1177/001979390706000201 [Accessed 21 November 2022].

Beckert, F. (2020) Gender Diversity in der Tech-Branche: Warum Frauen nach wie vor unterrepräsentiert sind. *Verlag Babara Budrich*. Available from: <a href="https://library.oapen.org/handle/20.500.12657/43312">https://library.oapen.org/handle/20.500.12657/43312</a> [Accessed 20 November 2022].

Bowles, H. R., Babcock, L. & Lai, L. (2007) Social incentives for gender differences in the propensity to initiate negotiations: Sometimes it does hurt to ask. *Organizational Behavior and human decision Processes* 103(1): 84-103. Available from: <a href="https://www.sciencedirect.com/science/article/pii/S0749597806000884">https://www.sciencedirect.com/science/article/pii/S0749597806000884</a> [Accessed 24 November 2022].

Bundesministerium für Familie, Senioren, Frauen und Jugend (2022) Lohngerechtigkeit. Available from:

https://www.bmfsfj.de/bmfsfj/themen/gleichstellung/frauen-und-arbeitswelt/lohngerechtigkeit/lohngerechtigkeit-80398 [Accessed 17 November 2022].

Deutscher Bundestag (2016) Sachstand Gender: Begriff, Historie und Akteure. Available from:

https://www.bundestag.de/resource/blob/425662/d6f1279b77bec6f5770c31b6a43197 25/WD-9-025-16-pdf-data.pdf [Accessed 18 November 2022].

Eurostat (2022) Gender pay gap in unadjusted form. Available from: <a href="https://ec.europa.eu/eurostat/databrowser/view/sdg\_05\_20/default/table?lang=en">https://ec.europa.eu/eurostat/databrowser/view/sdg\_05\_20/default/table?lang=en</a> [Accessed 18 November 2022].

EY (2022) Große Gehaltssprünge für deutsche Vorstände – Frauen verdienen deutlich mehr als Männer. Available from: <a href="https://www.ey.com/de\_de/news/2022-pressemitteilungen/11/grosse-gehaltsspruenge-fuer-deutsche-vorstaende">https://www.ey.com/de\_de/news/2022-pressemitteilungen/11/grosse-gehaltsspruenge-fuer-deutsche-vorstaende</a> [Accessed 25 November 2022].

Fuchs, M., Rossen, A., Weyh, A. & Wydra-Somaggio, G. (2019) Unterschiede in der Lohnlücke erklären sich vor allem durch die Betriebslandschaft vor Ort. Available from: <a href="https://doku.iab.de/kurzber/2019/kb1019.pdf">https://doku.iab.de/kurzber/2019/kb1019.pdf</a> [Accessed 22 November 2022].

Goldin, C., Kerr, S. P., Olivetti, C., & Barth, E. (2017) The expanding gender earnings gap: Evidence from the LEHD-2000 Census. *American Economic Review 107*(5): 110-14. Available from: <a href="https://pubs.aeaweb.org/doi/pdfplus/10.1257/aer.p20171065">https://pubs.aeaweb.org/doi/pdfplus/10.1257/aer.p20171065</a> [Accessed 20 November 2022].

Hirsch, B. (2013) The impact of female managers on the gender pay gap: Evidence from linked employer–employee data for Germany. *Economics Letters* 119(3): 348-

350. Available from:

https://www.sciencedirect.com/science/article/pii/S0165176513001304 [Accessed 23 November 2022].

Holst, E. & Marquardt, A. (2018) Die Berufserfahrung in Vollzeit erklärt den Gender Pay Gap bei Führungskräften maßgeblich. *DIW Wochenbericht* 30:669-678. Available from:

https://www.diw.de/de/diw 01.c.595023.de/publikationen/wochenberichte/2018 30 3 /die berufserfahrung in vollzeit erklaert den gender pay gap bei fuehrungskraeft en massgeblich.html [Accessed 19 November 2022].

Kingham, S. (2018) Women in Tech: How does Germany compare to the rest of Europe? *Honeypot*. Available from: <a href="https://blog.honeypot.io/women-in-tech-germany/">https://blog.honeypot.io/women-in-tech-germany/</a> [Accessed 19 November 2022].

Kleven, H., Landais, C., & Søgaard, J. E. (2019) Children and gender inequality: Evidence from Denmark. *American Economic Journal: Applied Economics 11*(4): 181-209. Available from: <a href="https://www.aeaweb.org/articles?id=10.1257/app.20180010">https://www.aeaweb.org/articles?id=10.1257/app.20180010</a> [Accessed 21 November 2022].

Kulik, C. T. & Olekalns, M. (2012) Negotiating the gender divide: Lessons from the negotiation and organizational behavior literatures. *Journal of Management* 38(4): 1387-1415. Available from:

https://journals.sagepub.com/doi/full/10.1177/0149206311431307 [Accessed 23 November 2022].

Lang, V. & Groß, M. (2020) The just gender pay gap in Germany revisited: The male breadwinner model and regional differences in gender-specific role ascriptions. Research in Social Stratification and Mobility 65: 100473. Available from: <a href="https://www.sciencedirect.com/science/article/pii/S0276562420300020">https://www.sciencedirect.com/science/article/pii/S0276562420300020</a> [Accessed 25 November 2022].

Schrenker, A. & Wrohlich, K. (2022) Der Gender Pay Gap ist in den letzten 30 Jahren fast nur bei Jüngeren gesunken. DIW Berlin. Available from:

<a href="https://www.diw.de/de/diw 01.c.836567.de/publikationen/wochenberichte/2022\_09\_3/gender-pay-gap-ist-in-den-letzten-30-jahren fast nur bei juengeren gesunken.html">https://www.diw.de/de/diw\_01.c.836567.de/publikationen/wochenberichte/2022\_09\_3/gender-pay-gap-ist-in-den-letzten-30-jahren fast nur bei juengeren gesunken.html</a> [Accessed 21 November 2022].

Statistisches Bundesamt (2022) Pressemitteilung Nr. 088 vom 7. März 2022. Available from:

https://www.destatis.de/DE/Presse/Pressemitteilungen/2022/03/PD22\_088\_621.html [Accessed 17 November 2022].

Topalova, P., Christiansen, L. E., Pereira, M. J., Lin, M. H. H., & Turk, R. (2016) *Gender Diversity in Senior Positions and Firm Performance: Evidence from Europe*. Available from: <a href="https://www.imf.org/en/Publications/WP/Issues/2016/12/31/Gender-Diversity-in-Senior-Positions-and-Firm-Performance-Evidence-from-Europe-43771">https://www.imf.org/en/Publications/WP/Issues/2016/12/31/Gender-Diversity-in-Senior-Positions-and-Firm-Performance-Evidence-from-Europe-43771</a> [Accessed 14 November 2022].

Women in Tech (2019) Women in Tech Survey. Available from: <a href="https://www.womenintech.co.uk/doc/Women-in-Tech-Survey.pdf">https://www.womenintech.co.uk/doc/Women-in-Tech-Survey.pdf</a> [Accessed 20 November 2022].

Zucco, A. (2019) Große Gender Pay Gaps in einzelnen Berufen hängen stark mit der überproportionalen Entlohnung von langen Arbeitszeiten zusammen. DIW Wochenbericht 10: 127 – 136. Available from:

https://www.diw.de/de/diw 01.c.616035.de/publikationen/wochenberichte/2019 10 1 /grosse gender pay gaps in einzelnen berufen haengen stark mi rproportion alen entlohnung von langen arbeitszeiten zusammen.html [Accessed 22 November 2022].

Zucco, A. (2020) Der Gender Pay Gap in IT-Berufen. Expertise für den Dritten Gleichstellungsbericht der Bundesregierung. Available from: <a href="https://www.dritter-gleichstellungsbericht.de/de/article/222.gender-pay-gap.html">https://www.dritter-gleichstellungsbericht.de/de/article/222.gender-pay-gap.html</a> [Accessed 19 November 2022].