

Descriptive Analysis on Pay Equity at the University of Memphis

United Campus Workers, Communications Workers of America

June 2019

The analysis below is from a University of Memphis (UM) dataset of 2,579 full-time employees provided by the institution in Fall 2018.

Overall, 31% of UM employees are Black, 60% white, 6% Asian, 1% Multiracial, and 1% did not provide race/ethnicity data. The median age of UM employees is 49 years old. Women comprise 56% of the workforce. Twenty-five percent of employees make over \$75k annually, 32% make between \$50-75k, 29% make between \$30-50k, and 13% make under 30k, well below a living wage.

Along with low pay for 13% of the workforce, the most significant finding from this data is that the deep pay inequities at the University of Memphis are primarily from extreme segregation of women and people of color into specific categories of work (e.g. service and clerical) and within these categories into the lowest-paying jobs.

*Ninety-three percent of the 221 clerical workers with an average salary of \$38k annual are women and 51% are Black and 74% of the 344 service/maintenance workers making an average salary of 27k annual are Black. **Across job categories, of all the workers at the university making less than \$30k, 63% are women and 78% are Black;** among those making between 30k-50k, 67% are women and 39% Black.*

At the other extreme, of the 315 employees in executive/managerial roles with an average salary of \$104k, just 24% are Black. Among full-time faculty who make \$77k on average, only 10% are Black. Of all workers at UM making over \$75k, just 13% are Black and only 36% are women. To offer points of comparison: the City of Memphis is 63% Black and UM's student body is 37% Black, 6% Hispanic/Latinx, and 4% Asian.

These trends will be covered in more detail in the analysis that follows but are worth pulling out at the top as they frame the analysis.

Women workers at UM

As Table 1 below reflects, the median salary for all full-time employees at UM is \$54,158. The median for men is \$63,694, while the median for women is \$49,354, a differential of \$14,340.

Table 1: UM Employment and Compensation by Gender						
	Employee Count	% of total employees	Average Annual Salary	Median Annual Salary	Average Womens' Salary as % of Mens' Salary	Median Womens' Salary as % of Mens' Salary
Women	1,435	56%	\$54,785	\$49,354	73%	77%
Men	1,150	44%	\$74,877	\$63,694	-	-
Grand Total	2,585	100%	\$63,700	\$54,158		

If we break down UM salaries by different pay ranges or pay bands, we find that men are clustered in higher-paying bands and women in lower paying bands, as shown in Table 2.

Table 2: Employee Gender by Pay Band				
Annual Salary Range	Count	% of total workforce	Women	Men
<\$30K	347	13%	63%	37%
\$30-50K	755	29%	67%	33%
\$50K-75K	831	32%	56%	43%
\$75K-100K	344	13%	45%	55%
\$100K-\$125K	131	5%	30%	70%
\$125K-175K	105	4%	31%	69%
\$175 and above	70	2%	19%	81%

Men are clustered in higher pay bands starting at \$75k; about 70% of all employees making between \$100k and \$175k are men. Eighty-one percent or 57 of the total 70 employees making \$175k or more are men. Meanwhile, women are disproportionately clustered in the lower pay bands: Over 60% of the employees making \$30k and below and between \$30K-\$50K are women.

Four-hundred and ten or 36% of the total workforce of 1,150 men working at the university are high-earners, making more than 75k; while only 240 or 17% of all the women working at the university make over 75k.

Women Workers, Wages, and Years of Service

As Table 3 below reflects, 44% or 1,138 of UM employees are recent hires, with from 0-5 years of experience. The median years of service with the institution is 7.37, higher than the national median of 6.8 for the public sector, but lower than the federal government employee median of 8.3.¹

Seven-hundred and eighty nine workers (one-third of the workforce) have been with the institution for 6-15 years. An additional 375 workers or 15% of the total workforce have between 16 and 25 years of service. Over 11% of the total workforce or 283 people have been with the institution for over 26 years.

Table 3: Years of Service

Years of Service	# of employees	Percent of total
0-5	1138	44%
6-10	462	18%
11-15	327	13%
16-20	250	10%
21-25	125	5%
26-30	113	4%
31+	170	7%

As Table 4 below indicates, men and women are nearly equally distributed across years of service groups, although there are more men who have been with the institution for over 26 years than women.

Table 4: Years of Service by Job Category, Gender, and Average Salary

Years of service		Average	Average for men	% men	Average for women	% women	Womens' pay differential
0-5	1138	\$56,720	\$65,860	44%	\$49,596	56%	-\$16,263
6-10	462	\$61,548	\$70,488	40%	\$55,577	60%	-\$14,911
11-15	327	\$69,834	\$79,903	43%	\$62,390	57%	-\$17,514
16-20	250	\$68,021	\$79,322	47%	\$58,003	53%	-\$21,319
21-25	125	\$72,356	\$87,871	45%	\$59,765	55%	-\$28,106
26-30	113	\$80,619	\$96,540	51%	\$63,830	49%	-\$32,710
31+	170	\$80,500	\$96,988	56%	\$59,616	44%	-\$37,371

¹ <https://www.bls.gov/news.release/tenure.nr0.htm>

Recruitment of women in recent years has been on par with university-level trends: 56% of those hired within the last 5 years have been women, consistent with the overall percentage of women employed at the institution.

Women at the top, middle, and bottom of the seniority pyramid make less than men. Among those women with less than 5 years of service, the average salary is \$16,263 less than the average salary for men. As years of service with the institution increase, men make significantly more than women. Men who have been with the institution for over 31 years make an astounding \$37,371 more than women who have been with the institution for the same time period.

For the most part, this differential is explained—although not justified—due to more pronounced historical gender discrimination in the 1970’s and 1980’s that determined fields of work open to women. Specifically, 81% of the men in this group are in higher-paying faculty or executive and managerial positions while only 33% of the women are in these job categories. Instead, 65% of the women workers who have been with the institution for 31+ years are concentrated in clerical, service, and lower-paid staff positions, such as “library assistant,” or “law school counselor.”

Years of Service, Salary, Gender and Job Category

While the trends presented above are for the total university workforce, it is important to look more closely at patterns by job category. Table 5 below includes the 315 total executive and managerial administrators at the university. As the table reveals, even for the 41 women and 56 men hired into administrative positions over the last five years, the gender pay gap for women is still considerable. With the exception of the 44 employees who have been with the institution for 16-20 years, the pay gap widens as years of service with the institution increase. While there are only nine men who have been with the institution for 31+ years, they make, on average, an astounding \$51,391 more than their women colleagues with 31+ years of service.

Table 5: Executive and managerial administrator Pay by Years of Service & Gender

Years of Service	Total number of employees	% men	Average salary for men	% women	Average salary for women	Differential
0-5	97	58%	\$101,029	42%	\$78,223	-\$22,806
6 to 10	57	46%	\$121,301	54%	\$92,977	-\$28,324
11 to 15	51	49%	\$128,406	51%	\$97,770	-\$30,636
16 to 20	44	48%	\$112,438	52%	\$99,786	-\$12,652
21 to 25	19	53%	\$118,823	47%	\$81,054	-\$37,769
26 to 30	26	58%	\$138,889	42%	\$96,911	-\$41,978
31+	21	52%	\$140,344	48%	\$88,953	-\$51,391

As shown in Table 6 below: of the 928 total faculty members at UM, 48% are women and 51% are men. However, of the nearly 500 faculty members hired in the last decade, a majority have been women. On the other hand, of the faculty members with over 16 years of service, the majority are men and only 19% of the 79 faculty members who have been with the institution for over 31 years are women.

Interestingly, for the small pool of faculty members who have been with the institution for over 26 years, the pay differential is not as large as it is for those who have been at the university for between 21 and 25 years. Over all, the gender pay differential for faculty has been getting better as time goes on. However, for the 392 faculty members hired in the last five years, the women still make, on average nearly \$8,000 less than the men. UM may explain away the degree of unequal pay for women faculty based on market-based pay differentials by discipline. Not only are extreme market-based justifications unjust, reinforcing structural racism and gender discrimination but they also don't hold up on their own terms. The pipeline of women earning PhDs across all disciplines today suggests there are plenty of women job candidates in all fields, should this be a priority.² Further statistical analysis will investigate the particular differences in faculty pay by race, gender, and years of service to determine more specific recommendations.

Table 6: Faculty Pay by Years of Service & Gender

Years of Service	Total Number of employees	% men	Average salary for men	% women	Average salary for women	Differential
0-5	392	45%	\$72,182	55%	\$64,240	-\$7,942
6 to 10	175	49%	\$77,092	51%	\$66,239	-\$10,853
11 to 15	119	45%	\$92,126	55%	\$73,541	-\$18,585
16 to 20	81	64%	\$91,411	36%	\$74,542	-\$16,869
21 to 25	43	56%	\$106,277	44%	\$78,266	-\$28,011
26 to 30	39	64%	\$104,088	36%	\$90,634	-\$13,454
31+	79	81%	\$103,325	19%	\$89,511	-\$13,814

Table 7 shows that women make up the majority of workers in the “other professional” category. Over time the gender pay gap for women in this category has gotten better and is considerably smaller than it is for faculty or administrators at the university; however, on average, the 215 women hired within the past 5 years into professional staff roles with the institution still make \$7,000 less than men in the same job category. This is mostly due to differences in pay across areas of work where men and women are segregated: men in staff positions at the university are concentrated in jobs such as in the Information Technology department, whereas women workers are more heavily concentrated in areas such as academic advising and in the library.

² <https://www.weforum.org/agenda/2018/10/chart-of-the-day-more-women-than-men-earned-phds-in-the-us-last-year/>

Table 7: “Other Professional” Pay by Years of Service & Gender

Years of Service	Total number of employees	% men	Average salary for men	% women	Average salary for women	Differential
0-5	346	38%	\$50,467	62%	\$43,549	-\$6,918
6 to 10	118	31%	\$54,163	69%	\$47,688	-\$6,475
11 to 15	88	36%	\$53,350	64%	\$51,558	-\$1,792
16 to 20	64	39%	\$56,367	61%	\$50,436	-\$5,931
21 to 25	36	44%	\$62,405	56%	\$54,298	\$8,107
26 to 30	23	48%	\$61,564	52%	\$45,763	-\$15,801
31+	44	20%	\$71,854	80%	\$46,659	-\$25,195

The low total number of service/maintenance workers in each longevity group shown in Table 8 below make it difficult to say anything meaningful about the pay gaps at this level of analysis. However, there does appear to be some gender-based pay gap in this category, but interestingly it is markedly smaller than in other areas of work at the university.

Table 8: “Service/Maintenance” Pay by Years of Service & Gender

Years of Service	Total number of employees	% men	Average salary for men	% women	Average salary for women	Differential
0-5	173	56%	\$27,385	44%	\$23,463	-\$3,922
6 to 10	63	49%	\$32,367	51%	\$24,783	-\$7,584
11 to 15	36	61%	\$36,237	39%	\$22,794	-\$13,443
16 to 20	35	43%	\$29,696	57%	\$24,135	-\$5,561
21 to 25	10	50%	\$31,618	50%	\$25,620	-\$5,998
26 to 30	13	46%	\$33,793	54%	\$27,599	-\$6,194
31+	14	71%	\$32,249	29%	\$34,185	+\$1,936

Employment and Wages by Race and Ethnicity

The city of Memphis is 63% Black, 25% white, and 8% Hispanic/Latinx and UM's student body is 37% Black, 6% Hispanic/Latinx, and 4% Asian. UM's workforce is far from representative of the city or the university. As Table 9 below reflects, of the 2,566 UM employees that provided race/ethnicity data: 61% identified as white, 31% as Black, 6% as Asian, 1% as multiracial, and .4% as Alaska Native/American Indian/Native Hawaiian.³ While the white workforce at UM is evenly split between men and women, Black women make up 68% of the Black workforce at the institution.

Table 9: UM Employees by Race/ethnicity and Gender

Race	total employee count	% of total workforce	% women	% men
Alaska Native/American Indian/ Native Hawaiian	10	0.4%	50%	50%
Asian	163	6%	34%	66%
Black	806	31%	68%	32%
Multiracial	25	1%	60%	40%
White	1562	61%	51%	49%

Table 10 below shows that Black employees at the University of Memphis have a median salary that is 64% of the white counterpart. In dollar terms, the median salary for Black employees is \$21,859 less than the white-employee median.

³ U.S. Bureau of Census, "Quick Facts: Memphis city Washington," accessed March 11, 2019: <https://www.census.gov/quickfacts/fact/table/seattlecitywashington,US/PST045217>.

Table 10: Salary by Race/Ethnicity⁴

	All UM employees	White	Black
Average salary	\$64,700	\$70,013	\$46,071
Median salary	\$54,158	\$61,000	\$39,141
Difference from all-employee average		+5,313	-\$18,629
Difference from all-employee median		+6,842	-\$15,017

Table 11 below breaks average and median salary out by race and gender, illustrating that the median salary of \$38,577 for Black women at the University of Memphis is 70% the white women median salary of \$54,898, 63% the all-employee median salary, and 57% the white men median of \$66,969.

Put another way, Black women at the University of Memphis make just slightly more than half of what white men make.

The median salary for white women at the University is \$12,000 less than the average for white men. The median salary for Black women, however, is only about \$1,500 lower than the median for Black men. Again, this is likely due to job segregation: 67% of the Black men that work at the University make less than 50k, and 34% make less than 30k while only 24% of the white men that work at the University make less than 50k and just 4% make less than 30k.

⁴ Due to the low number of multiracial and Asian employees at UM, only Black and White employees are included.

Table 11: Average and Median Salary by Race and Gender

	White men	Black men	Asian men	White women	Black women	Asian women
Average salary	\$80,262	\$49,856	\$99,830	\$60,313	\$44,282	\$74,548
Median salary	\$66,969	\$40,000	\$83,334	\$54,898	\$38,577	\$68,465
Difference from all-employee average	+15,562	-\$24,700	\$18,634	-\$4,387	-\$20,418	+\$9,843
Difference from all-employee median	+\$12,803	-\$14,166	+\$29,168	+\$732	-\$15,589	+\$14,299

Disparity in Wages Based on Race/Ethnicity and Years of Service

Table 12 breaks out wages by race/ethnicity and years of service. Pay inequities by race are the most extreme for those that have been with the institution the longest. For instance, Black workers who have been with the institution for between 26 and 30 years make \$38,000 less than their white peers. For those who have only been with the institution for 0-5 years the differential is over \$17,000, still quite high, but \$20,000 less than for those hired in the 1990's. The distribution of workers by longevity is similar for white and black workers; however, 48% of all Black workers were hired in the last five years while only 41% of white workers are recent hires. This could reflect more intentional recruitment of Black employees and/or higher turnover of Black workers over time.

Table 12: Average Salary by Race and Years of Service

Years of service	White average salary	# of white employees	% of total white workers	Black average salary	# of Black employees	% of total Black workers	Black worker differential
0-5	\$61,368	642	41%	\$44,052	387	48%	-\$17,317
6-10	\$67,131	304	19%	\$52,161	125	15%	-\$14,970
11-15	\$75,276	195	12%	\$52,160	108	13%	-\$23,116
16-20	\$76,913	81	9%	\$45,019	148	10%	-\$31,894
21-25	\$80,317	76	5%	\$50,665	38	5%	-\$29,652
26-30	\$89,957	81	5%	\$51,417	31	4%	-\$38,540
31+	\$86,643.25	119	8%	\$55,382.28	37	5%	-\$31,261

The pay differentials between white women and black women across the university are shown in Table 13 below and indicate that Black and white women hired in the 1990's and before had a smaller gap than they do today. Low numbers in these categories mean they are illustrative only and not conclusive.

Table 13: Average Salary for Black and White Women by Years of Service

Years of service	White women	Total number of white women	Black women	Total number of Black women	Black women differential (compared to white women)
0-5	\$54,203	349	\$39,556	242	-\$14,647
6-10	\$61,880	169	\$42,090	96	-\$19,790
11-15	\$65,845	103	\$55,278	73	-\$10,568
16-20	\$68,797	70	\$44,270	57	-\$24,528
21-25	\$68,573	33	\$46,877	30	-\$21,696
26-30	\$71,867	30	\$54,185	25	-\$17,682
31+	\$62,054	49	\$53,276	24	-\$8,778

Still, taken together, the data suggests that gender discrimination may have affected all women workers at the University more evenly in the 1990's and before. Then, in the late 1990's, the ceiling into higher paying jobs was lifted somewhat for white women. The relatively low differential for women at the institution for 11-15 years may be a result of intentional hiring of women of color into faculty and executive positions, attempts to address pay inequities by position or department, or may simply be random.

As noted above, the large differentials in pay between women and men and Black and white workers at the University of Memphis are in part due to extreme job segregation—where most of the women and Black employees are concentrated in lower-paying jobs. The degree of job segregation by race and gender--and how it affects high level pay differentials--is reflected in Table 14 below.

Table 14: Average Salary by Race/Ethnicity and Job Category

	# of employees	Average salary	% women	% Black	% White	% Asian
Athletics	58	\$122,428	21%	22%	67%	3%
Executive/managerial	315	\$104,011	48%	24%	69%	6%
Faculty	928	\$77,183	48%	10%	75%	13%
Other professional	719	\$49,239	64%	36%	60%	3%
Clerical	221	\$38,017	93%	51%	48%	
Service/Maintenance	344	\$27,396	46%	74%	24%	

Further, Table 15 below reveals that across the university there is also significant segregation between pay bands. This is important because it means that not only are women and/or Black workers segregated into categories of work as Table 14 above reflects, but that within these categories they are further segregated into the lowest paying positions. With very few exceptions, in each category of work at the university, as position/rank and salary rise, the number of Black and women workers drops.

Table 15 Average salary by race by pay band

All workers							
Job Category & Pay Band	# of workers	% women	% Black	% white	white average	Black average	Differential
Under \$30k	343	63%	78%	21%	\$25,277	\$23,684	-\$1,593
\$30k-50k	755	67%	39%	57%	\$40,159	\$39,437	-\$721
\$50k-75k	831	57%	20%	71%	\$61,455	\$59,951	-\$1,505
\$75k-100k	344	45%	13%	71%	\$84,404	\$83,416	-\$988
\$100k and above	306	28%	12%	74%	\$148,517	\$154,952	+\$6,435
Clerical							
Under \$30k	38	90%	71%	29%	\$26,932	\$27,184	\$252
\$30k-50k	153	97%	49%	50%	\$36,072	\$36,234	\$162
\$50k-75k	28	79%	32%	61%	\$59,599	\$62,775	\$3,176
\$75k-100k	2	100%	100%	0%		\$75,239	
Service							
Under \$30k	245	56%	85%	13%	\$24,111	\$22,721	-\$1,390
\$30k-50k	91	21%	45%	51%	\$37,761	\$36,648	-\$1,113
\$50-75k	8	13%	63%	37%	\$55,625	\$53,626	-\$1,999
Other professional							
Under \$30k	61	72%	51%	46%	\$25,725	\$26,906	\$1,181
\$30k-50k	384	69%	41%	55%	\$40,867	\$41,363	\$496
\$50k-75k	227	59%	29%	67%	\$58,296	\$56,462	-\$1,834
\$75 and above	44	36%	14%	82%	\$145,775	\$121,673	-\$24,102

Job Category & Pay Band	# of workers	% women	% Black	% white	white average	Black average	Differential
Executive/managerial							
\$30-50k	11	54%	34%	62%	\$44,444	\$48,518	\$4,074
\$50k-75k	110	54%	32%	61%	\$62,178	\$61,635	-543
\$75k-100k	75	60%	24%	67%	\$85,066	\$84,339	-727
\$100k-125k	39	44%	18%	72%	\$108,134	\$108,596	462
\$125-150k	26	38%	15%	77%	\$133,618	\$138,448	\$4,830
\$150-200k	24	38%	8%	92%	\$173,033	\$150,000	-\$23,033
\$200k and above	28	18%	11%	68%	\$250,732	\$248,384	-\$2,348
Faculty							
\$30-50k	105	64%	11%	75%	\$43,307	\$41,702	-\$1,605
\$50k-75k	442	57%	11%	77%	\$62,735	63,578	\$843
\$75k-100k	227	43%	10%	71%	\$84,306	\$82,706	-\$1,600
\$100k-125k	82	17%	9%	70%	\$111,926	\$109,117	-\$2,809
\$125-150k	33	30%	6%	90%	\$137,610	\$130,926	-\$6,684
\$150 and above	36	22%	6%	64%	\$186,847	\$165,208	-\$21,639

Additional analysis on this data will be necessary to better understand the inequities by position and department. We plan to run multiple regression analyses on this data, controlling for years of service, department/discipline (for faculty), and different categories of work and pay in order to better understand the severity of the problem across different contexts. However, from this initial and basic descriptive analysis alone it is clear that the University of Memphis is not doing enough to create intentional hiring policies to ensure that women and Black workers are represented at all levels of work at the institution. They are also not adequately eliminating ceilings that prevent Black and women employees from gaining access to higher-paying positions, even after significant tenure with the institution.