



SUSANA A. MENDOZA
ILLINOIS STATE COMPTROLLER

PAYROLL BULLETIN

TO: All State Agencies, Boards and Commissions
FROM: Kathleen Killion, Assistant Comptroller - Operations
DATE: December 21, 2023
SUBJECT: Federal Tax Withholding Tables - 2024
NUMBER: 5-23

The IRS has posted [Publication 15-T Federal Income Tax Withholding Methods for use in 2024](#). These federal tax withholding tables are effective for the January 1-15, 2024, pay period.

Agencies should reference the applicable tax table for calculating federal tax withholding based on the W-4 form the employee has on file. Due to changes the IRS made to the W-4 form that became effective January 1, 2020, there is now more than one tax table per pay frequency.

- 2019 or older W-4 forms – Agencies should utilize the tax tables found on page 3 of this bulletin for employees that have a 2019 or older W-4 form on file. Exemptions may still be used with these forms. A sample withholding calculation and the exemption amounts for use with these forms can be found on page 2 of this bulletin.
- 2020 or newer W-4 forms - Agencies should utilize the tax tables found on pages 5-7 of this bulletin for employees that have completed a 2020 or newer W-4 form. Exemptions are not used with these forms. A sample withholding calculation for use with these forms can be found on page 4 of this bulletin.

If you have questions concerning this Payroll Bulletin, please contact Katie Guy at Katie.Guy@illinoiscomptroller.gov. Agencies may access this and other [Accounting](#), [Payroll](#), and [SAMS](#) Bulletins on the IOC website.

2019 or older W-4 Forms – Exemptions, Sample Calculation, and Tax Tables

Exemptions

For employees that have a 2019 or older W-4 on file claiming exemptions, multiply the number of elected exemptions by the applicable payroll frequency amount below.

Bi-weekly	\$165.00
Semi-monthly	\$179.00
Monthly	\$358.00

Sample Calculation

This sample calculation is for an employee that has a 2019 or older W-4 form on file stating they are married and claiming 3 exemptions. The employee is paid on a semi-monthly basis.

To calculate this employee’s federal tax withholding, first determine the employee’s taxable wages for the pay period by subtracting the exemption amount and then any non-taxable deductions from the employee’s gross pay such as deferred compensation, tax sheltered annuities, non-taxable benefits, flexible spending, deducted retirement, and tax deferral retirement service purchases. Then add any other compensation subject to withholding. In the sample below the employee’s gross wages for the pay period are \$2,500 but the employee’s taxable wages for the pay period are \$1,870.

Gross pay, semi-monthly	\$2,500.00
Less: 3 Exemptions (\$179.00 * 3)	- 537.00
Less: Non-taxable deductions described above	- 125.00
Add: Any other compensation subject to withholding	+ 32.00
Taxable wages for this pay period	\$1,870.00
From 2024 federal tax tables for 2019 or older W-4 forms:	
Less: Tax on \$1,870.00, semi-monthly, married filing jointly	- 1,646.00
Amount that the wage exceeds tax	\$224.00
Percent to apply to wage exceeding tax	* 12%
	\$ 26.88
Add: amount to withhold from tax table	+ 96.70
Withholding amount for this pay period	\$123.58

2024 Federal Tax Tables for 2019 or older W-4 Forms

BIWEEKLY Payroll Period										
MARRIED Persons					SINGLE Persons					
If the Adjusted Wage Amount (line 1d) is		The tentative amount to withhold is...	Plus this percentage ...	of the amount that the wage exceeds...	If the Adjusted Wage Amount (line 1d) is		The tentative amount to withhold is...	Plus this percentage ...	of the amount that the wage exceeds...	
at least...	But less than...				at least...	But less than...				
A	B	C	D	E	A	B	C	D	E	
\$0	\$627	\$0.00	0%	\$0	\$0	\$231	\$0.00	0%	\$0	
\$627	\$1,519	\$0.00	10%	\$627	\$231	\$677	\$0.00	10%	\$231	
\$1,519	\$4,254	\$89.20	12%	\$1,519	\$677	\$2,044	\$44.60	12%	\$677	
\$4,254	\$8,360	\$417.40	22%	\$4,254	\$2,044	\$4,097	\$208.64	22%	\$2,044	
\$8,360	\$15,392	\$1,320.72	24%	\$8,360	\$4,097	\$7,613	\$660.30	24%	\$4,097	
\$15,392	\$19,375	\$3,008.40	32%	\$15,392	\$7,613	\$9,605	\$1,504.14	32%	\$7,613	
\$19,375	\$28,750	\$4,282.96	35%	\$19,375	\$9,605	\$23,667	\$2,141.58	35%	\$9,605	
\$28,750		\$7,564.21	37%	\$28,750	\$23,667		\$7,063.28	37%	\$23,667	

SEMIMONTHLY Payroll Period										
MARRIED Persons					SINGLE Persons					
If the Adjusted Wage Amount (line 1d) is		The tentative amount to withhold is...	Plus this percentage ...	of the amount that the wage exceeds...	If the Adjusted Wage Amount (line 1d) is		The tentative amount to withhold is...	Plus this percentage ...	of the amount that the wage exceeds...	
at least...	But less than...				at least...	But less than...				
A	B	C	D	E	A	B	C	D	E	
\$0	\$679	\$0.00	0%	\$0	\$0	\$250	\$0.00	0%	\$0	
\$679	\$1,646	\$0.00	10%	\$679	\$250	\$733	\$0.00	10%	\$250	
\$1,646	\$4,608	\$96.70	12%	\$1,646	\$733	\$2,215	\$48.30	12%	\$733	
\$4,608	\$9,056	\$452.14	22%	\$4,608	\$2,215	\$4,439	\$226.14	22%	\$2,215	
\$9,056	\$16,675	\$1,430.70	24%	\$9,056	\$4,439	\$8,248	\$715.42	24%	\$4,439	
\$16,675	\$20,990	\$3,259.26	32%	\$16,675	\$8,248	\$10,405	\$1,629.58	32%	\$8,248	
\$20,990	\$31,146	\$4,640.06	35%	\$20,990	\$10,405	\$25,640	\$2,319.82	35%	\$10,405	
\$31,146		\$8,194.66	37%	\$31,146	\$25,640		\$7,652.07	37%	\$25,640	

MONTHLY Payroll Period										
MARRIED Persons					SINGLE Persons					
If the Adjusted Wage Amount (line 1d) is		The tentative amount to withhold is...	Plus this percentage ...	of the amount that the wage exceeds...	If the Adjusted Wage Amount (line 1d) is		The tentative amount to withhold is...	Plus this percentage ...	of the amount that the wage exceeds...	
at least...	But less than...				at least...	But less than...				
A	B	C	D	E	A	B	C	D	E	
\$0	\$1,358	\$0.00	0%	\$0	\$0	\$500	\$0.00	0%	\$0	
\$1,358	\$3,292	\$0.00	10%	\$1,358	\$500	\$1,467	\$0.00	10%	\$500	
\$3,292	\$9,217	\$193.40	12%	\$3,292	\$1,467	\$4,429	\$96.70	12%	\$1,467	
\$9,217	\$18,113	\$904.40	22%	\$9,217	\$4,429	\$8,877	\$452.14	22%	\$4,429	
\$18,113	\$33,350	\$2,861.52	24%	\$18,113	\$8,877	\$16,496	\$1,430.70	24%	\$8,877	
\$33,350	\$41,979	\$6,518.40	32%	\$33,350	\$16,496	\$20,810	\$3,259.26	32%	\$16,496	
\$41,979	\$62,292	\$9,279.68	35%	\$41,979	\$20,810	\$51,279	\$4,639.74	35%	\$20,810	
\$62,292		\$16,389.23	37%	\$62,292	\$51,279		\$15,303.89	37%	\$51,279	

2020 or newer W-4 Forms –Sample Calculation and Tax Tables

This sample calculation is for an employee that is paid on a semi-monthly basis and has completed a 2020 or newer W-4 form. The employee has checked “Married Filing Jointly” in Step 1 on the W-4 form. The employee did not check the box in Step 2. The employee made entries in Steps 3 and 4. In Step 3 the employee entered an amount of \$500 to claim a dependent. In Step 4 the employee entered \$24,000 on Line 4a for additional income, \$6,000 on Line 4b to claim deductions, and \$50 on Line 4c for additional tax withholding. The employer will calculate withholding using the **left side** of the married filing jointly, semi-monthly tax table because the employee did not check the box in step 2.

To calculate this employee’s federal tax withholding, first determine the employee’s taxable wages for the pay period by subtracting any non-taxable deductions from the employee’s gross pay such as deferred compensation, tax sheltered annuities, non-taxable benefits, flexible spending, deducted retirement, and tax deferral retirement service purchases. Then add any other compensation subject to withholding. In the sample below the employee’s gross wages for the pay period are \$2,000 but the employee’s taxable wages for the pay period are \$1,907.

Gross pay, semi-monthly	\$2,000.00
Less: Non-taxable deductions described above	- 125.00
Add: Any other compensation subject to withholding	+ 32.00
Taxable wages for this pay period	\$1,907.00
<i>From employee’s W-4 form:</i>	
Add: Line 4a divided by the number of pay periods (\$24,000/24)	+1,000.00
Less: Line 4b divided by the number of pay periods (\$6,000/24)	-250.00
Adjusted taxable amount for this pay period	\$2,657.00
<i>From 2024 federal tax tables for a 2020 or newer W-4 form:</i>	
Less: Tax on \$2,657.00 from left tax table, semi-monthly, married filing jointly	-2183.00
Amount that the wage exceeds tax	\$474.00
Percent to apply to wage exceeding tax	*12%
	\$56.88
Add: tentative amount to withhold from tax table	+96.60
Tentative withholding amount for this pay period	\$153.48
<i>From employee’s W-4 form:</i>	
Less: Line 3 divided by the number of pay periods (\$500/24)	-20.83
	\$132.65
<i>From employee’s W-4 form</i>	
Add: Line 4c, do not divide this line by the number of pay periods (\$50)	+50.00
Withholding amount for this pay period	\$182.65

2024 Federal Tax Tables for 2020 or newer W-4 Forms

2024 Percentage Method Tables for Manual Payroll Systems With Forms W-4 from 2020 or Later BIWEEKLY Payroll Period									
STANDARD Withholding Rate Schedules <small>(Use these if the box in Step 2 of Form W-4 is NOT checked)</small>					Form W-4, Step 2, Checkbox, Withholding Rate Schedules <small>(Use these if the box in Step 2 of Form W-4 IS checked)</small>				
If the Adjusted Wage Amount (line 1h) is:		The tentative amount to withhold is:	Plus this percentage—	of the amount that the Adjusted Wage exceeds—	If the Adjusted Wage Amount (line 1h) is:		The tentative amount to withhold is:	Plus this percentage—	of the amount that the Adjusted Wage exceeds—
At least—	But less than—				At least—	But less than—			
A	B	C	D	E	A	B	C	D	E
Married Filing Jointly					Married Filing Jointly				
\$0	\$1,123	\$0.00	0%	\$0	\$0	\$562	\$0.00	0%	\$0
\$1,123	\$2,015	\$0.00	10%	\$1,123	\$562	\$1,008	\$44.60	12%	\$1,008
\$2,015	\$4,750	\$89.20	12%	\$2,015	\$1,008	\$2,375	\$208.64	22%	\$2,375
\$4,750	\$8,856	\$417.40	22%	\$4,750	\$2,375	\$4,428	\$660.30	24%	\$4,428
\$8,856	\$15,888	\$1,320.72	24%	\$8,856	\$4,428	\$7,944	\$1,504.14	32%	\$7,944
\$15,888	\$19,871	\$3,008.40	32%	\$15,888	\$7,944	\$9,936	\$2,141.58	35%	\$9,936
\$19,871	\$29,246	\$4,282.96	35%	\$19,871	\$9,936	\$14,623	\$3,782.03	37%	\$14,623
\$29,246		\$7,564.21	37%	\$29,246	\$14,623				\$14,623
Single or Married Filing Separately					Single or Married Filing Separately				
\$0	\$562	\$0.00	0%	\$0	\$0	\$281	\$0.00	0%	\$0
\$562	\$1,008	\$0.00	10%	\$562	\$281	\$504	\$22.30	12%	\$504
\$1,008	\$2,375	\$44.60	12%	\$1,008	\$504	\$1,188	\$104.38	22%	\$1,188
\$2,375	\$4,428	\$208.64	22%	\$2,375	\$1,188	\$2,214	\$330.10	24%	\$2,214
\$4,428	\$7,944	\$660.30	24%	\$4,428	\$2,214	\$3,972	\$752.02	32%	\$3,972
\$7,944	\$9,936	\$1,504.14	32%	\$7,944	\$3,972	\$4,968	\$1,070.74	35%	\$4,968
\$9,936	\$23,998	\$2,141.58	35%	\$9,936	\$4,968	\$11,999	\$3,531.59	37%	\$4,968
\$23,998		\$7,063.28	37%	\$23,998	\$11,999				\$11,999
Head of Household					Head of Household				
\$0	\$842	\$0.00	0%	\$0	\$0	\$421	\$0.00	0%	\$0
\$842	\$1,479	\$0.00	10%	\$842	\$421	\$739	\$31.80	12%	\$421
\$1,479	\$3,269	\$63.70	12%	\$1,479	\$739	\$1,635	\$297.50	22%	\$1,635
\$3,269	\$4,708	\$278.50	22%	\$3,269	\$1,635	\$2,354	\$719.66	32%	\$2,354
\$4,708	\$8,225	\$595.08	24%	\$4,708	\$2,354	\$4,113	\$1,038.06	35%	\$4,113
\$8,225	\$10,215	\$1,439.16	32%	\$8,225	\$4,113	\$5,108	\$3,498.91	37%	\$5,108
\$10,215	\$24,279	\$2,075.96	35%	\$10,215	\$5,108	\$12,139			\$5,108
\$24,279		\$6,998.36	37%	\$24,279	\$12,139				\$12,139

2024 Percentage Method Tables for Manual Payroll Systems With Forms W-4 from 2020 or Later
SEMIMONTHLY Payroll Period

STANDARD Withholding Rate Schedules (Use these if the box in Step 2 of Form W-4 is NOT checked)					Form W-4, Step 2, Checkbox, Withholding Rate Schedules (Use these if the box in Step 2 of Form W-4 IS checked)				
If the Adjusted Wage Amount (line 1h) is:		The tentative amount to withhold is:	Plus this percentage—	of the amount that the Adjusted Wage exceeds—	If the Adjusted Wage Amount (line 1h) is:		The tentative amount to withhold is:	Plus this percentage—	of the amount that the Adjusted Wage exceeds—
At least—	But less than—				At least—	But less than—			
A	B	C	D	E	A	B	C	D	E
Married Filing Jointly					Married Filing Jointly				
\$0	\$1,217	\$0.00	0%	\$0	\$0	\$608	\$0.00	0%	\$0
\$1,217	\$2,183	\$0.00	10%	\$1,217	\$608	\$1,092	\$0.00	10%	\$608
\$2,183	\$5,146	\$96.60	12%	\$2,183	\$1,092	\$2,573	\$48.40	12%	\$1,092
\$5,146	\$9,594	\$452.16	22%	\$5,146	\$2,573	\$4,797	\$226.12	22%	\$2,573
\$9,594	\$17,213	\$1,430.72	24%	\$9,594	\$4,797	\$8,606	\$715.40	24%	\$4,797
\$17,213	\$21,527	\$3,259.28	32%	\$17,213	\$8,606	\$10,764	\$1,629.56	32%	\$8,606
\$21,527	\$31,683	\$4,639.76	35%	\$21,527	\$10,764	\$15,842	\$2,320.12	35%	\$10,764
\$31,683		\$8,194.36	37%	\$31,683	\$15,842		\$4,097.42	37%	\$15,842
Single or Married Filing Separately					Single or Married Filing Separately				
\$0	\$608	\$0.00	0%	\$0	\$0	\$304	\$0.00	0%	\$0
\$608	\$1,092	\$0.00	10%	\$608	\$304	\$546	\$0.00	10%	\$304
\$1,092	\$2,573	\$48.40	12%	\$1,092	\$546	\$1,286	\$24.20	12%	\$546
\$2,573	\$4,797	\$226.12	22%	\$2,573	\$1,286	\$2,398	\$113.00	22%	\$1,286
\$4,797	\$8,606	\$715.40	24%	\$4,797	\$2,398	\$4,303	\$357.64	24%	\$2,398
\$8,606	\$10,764	\$1,629.56	32%	\$8,606	\$4,303	\$5,382	\$814.84	32%	\$4,303
\$10,764	\$25,998	\$2,320.12	35%	\$10,764	\$5,382	\$12,999	\$1,160.12	35%	\$5,382
\$25,998		\$7,652.02	37%	\$25,998	\$12,999		\$3,826.07	37%	\$12,999
Head of Household					Head of Household				
\$0	\$913	\$0.00	0%	\$0	\$0	\$456	\$0.00	0%	\$0
\$913	\$1,602	\$0.00	10%	\$913	\$456	\$801	\$0.00	10%	\$456
\$1,602	\$3,542	\$68.90	12%	\$1,602	\$801	\$1,771	\$34.50	12%	\$801
\$3,542	\$5,100	\$301.70	22%	\$3,542	\$1,771	\$2,550	\$150.90	22%	\$1,771
\$5,100	\$8,910	\$644.46	24%	\$5,100	\$2,550	\$4,455	\$322.28	24%	\$2,550
\$8,910	\$11,067	\$1,558.86	32%	\$8,910	\$4,455	\$5,533	\$779.48	32%	\$4,455
\$11,067	\$26,302	\$2,249.10	35%	\$11,067	\$5,533	\$13,151	\$1,124.44	35%	\$5,533
\$26,302		\$7,581.35	37%	\$26,302	\$13,151		\$3,790.74	37%	\$13,151

2024 Percentage Method Tables for Manual Payroll Systems With Forms W-4 from 2020 or Later
MONTHLY Payroll Period

STANDARD Withholding Rate Schedules (Use these if the box in Step 2 of Form W-4 is NOT checked)					Form W-4, Step 2, Checkbox, Withholding Rate Schedules (Use these if the box in Step 2 of Form W-4 IS checked)				
If the Adjusted Wage Amount (line 1h) is:		The tentative amount to withhold is:	Plus this percentage—	of the amount that the Adjusted Wage exceeds—	If the Adjusted Wage Amount (line 1h) is:		The tentative amount to withhold is:	Plus this percentage—	of the amount that the Adjusted Wage exceeds—
At least—	But less than—				At least—	But less than—			
A	B	C	D	E	A	B	C	D	E
Married Filing Jointly					Married Filing Jointly				
\$0	\$2,433	\$0.00	0%	\$0	\$0	\$1,217	\$0.00	0%	\$0
\$2,433	\$4,367	\$0.00	10%	\$2,433	\$1,217	\$2,183	\$0.00	10%	\$1,217
\$4,367	\$10,292	\$193.40	12%	\$4,367	\$2,183	\$5,146	\$96.60	12%	\$2,183
\$10,292	\$19,188	\$904.40	22%	\$10,292	\$5,146	\$9,594	\$452.16	22%	\$5,146
\$19,188	\$34,425	\$2,861.52	24%	\$19,188	\$9,594	\$17,213	\$1,430.72	24%	\$9,594
\$34,425	\$43,054	\$6,518.40	32%	\$34,425	\$17,213	\$21,527	\$3,259.28	32%	\$17,213
\$43,054	\$63,367	\$9,279.68	35%	\$43,054	\$21,527	\$31,683	\$4,639.76	35%	\$21,527
\$63,367		\$16,389.23	37%	\$63,367	\$31,683		\$8,194.36	37%	\$31,683
Single or Married Filing Separately					Single or Married Filing Separately				
\$0	\$1,217	\$0.00	0%	\$0	\$0	\$608	\$0.00	0%	\$0
\$1,217	\$2,183	\$0.00	10%	\$1,217	\$608	\$1,092	\$0.00	10%	\$608
\$2,183	\$5,146	\$96.60	12%	\$2,183	\$1,092	\$2,573	\$48.40	12%	\$1,092
\$5,146	\$9,594	\$452.16	22%	\$5,146	\$2,573	\$4,797	\$226.12	22%	\$2,573
\$9,594	\$17,213	\$1,430.72	24%	\$9,594	\$4,797	\$8,606	\$715.40	24%	\$4,797
\$17,213	\$21,527	\$3,259.28	32%	\$17,213	\$8,606	\$10,764	\$1,629.56	32%	\$8,606
\$21,527	\$51,996	\$4,639.76	35%	\$21,527	\$10,764	\$25,998	\$2,320.12	35%	\$10,764
\$51,996		\$15,303.91	37%	\$51,996	\$25,998		\$7,652.02	37%	\$25,998
Head of Household					Head of Household				
\$0	\$1,825	\$0.00	0%	\$0	\$0	\$913	\$0.00	0%	\$0
\$1,825	\$3,204	\$0.00	10%	\$1,825	\$913	\$1,602	\$0.00	10%	\$913
\$3,204	\$7,083	\$137.90	12%	\$3,204	\$1,602	\$3,542	\$68.90	12%	\$1,602
\$7,083	\$10,200	\$603.38	22%	\$7,083	\$3,542	\$5,100	\$301.70	22%	\$3,542
\$10,200	\$17,821	\$1,289.12	24%	\$10,200	\$5,100	\$8,910	\$644.46	24%	\$5,100
\$17,821	\$22,133	\$3,118.16	32%	\$17,821	\$8,910	\$11,067	\$1,558.86	32%	\$8,910
\$22,133	\$52,604	\$4,498.00	35%	\$22,133	\$11,067	\$26,302	\$2,249.10	35%	\$11,067
\$52,604		\$15,162.85	37%	\$52,604	\$26,302		\$7,581.35	37%	\$26,302