

What is the difference between statutory, average, marginal and effective tax rates?

A taxpayer's *statutory tax rate* is the legally imposed rate, i.e. the 23% FairTax rate. In the personal income tax this would also be the tax rate schedule as shown in Table 1.

Table 1: 2010 federal personal income tax rates

Tax rate	Single filers	Married filing jointly or qualifying widow/widower	Married filing separately	Head of household	
10%	Up to 8,375	Up to \$16,750	Up to \$8,375	Up to \$11,950	
15%	\$8,376 - \$34,000	\$16,751 - \$68,000	\$8,376 - \$34,000	\$11,951 - \$45,550	
25%	\$34,001 – \$82,400	\$68,001 - \$137,300	\$34,001 - \$68,650	\$45,551 - \$117,650	
28%	\$82,401 - \$171,850	\$137,301 - \$209,250	\$68,651 - \$104,625	\$117,651 - \$190,550	
33%	\$171,851 – \$373,650	\$209,251- \$373,650	\$104,626 - \$186,825	\$190,551 -\$373,650	
35%	Over \$373, 650	Over \$373,650	Over \$186,826	Over \$373,650	

A taxpayer's average tax rate is the ratio of the amount of taxes paid to taxable income.

In 2010, a single individual who took the standard deduction and had an adjusted gross income of \$34,001 would be in the 25% tax bracket (statutory rate). In comparison, his average tax rate would have been only 10.9 percent.

This is because the standard deduction (\$5,700) and personal exemption (\$3,650) would have made the first \$9,350 of his income free of federal income tax. The next \$24,650 of his income would have been subject to the 15% rate or \$3,697.50 in taxes. Therefore, only \$1 of his income would have actually been subject to the 25% rate. His/her total tax would be \$3,697.50 plus 0.25 or \$3697.75. Dividing taxes by income yields an average tax rate of 10.9%.

A taxpayer's *marginal tax rate* is the tax rate that applies to the taxpayer's next dollar of taxable income. In the above example, 25% is the taxpayer's marginal tax rate. The tax on an additional \$1.00 earned is \$0.25.

Effective means the actual rate, i.e. the rate existing in fact. Both average and marginal tax rates can be expressed as effective tax rates.

An *effective marginal tax rate* may differ from a marginal tax rate because the taxpayer may be in an income range in which he is subject to a phase-out of some exclusion or deduction.

An *effective average tax rate* may differ from an average tax rate because some measure of income other than taxable income is used. For example, the Joint Committee on Taxation typically calculates the effective average tax rate as the ratio of taxes paid to a constructed measure of "economic income"

In assessing the economic effects of a tax system, the appropriate tax rates are the marginal or the effective marginal tax rates. Under the current federal income tax system, taxpayers face their highest tax rate, which is their marginal tax rate, at exactly the point at which they are most likely to be influenced by taxes – deciding whether or not it is "worth it" to them to work more.

What is a progressive tax system?

In a progressive tax system, marginal tax rates increase as income increases. For example, the income tax has statutory tax brackets of 0, 10, 15, 28, 33, and 35 percent, with each higher bracket taking effect at a higher level income than the preceding bracket (see Table 1).

The tax code contains many phase-outs of deductions, exemptions, and tax credits that can create a much higher effective marginal income tax rate than is implied by the statutory rates. For example, the child tax credit in the phase out range is reduced by \$50 for each \$1,000 of income above the threshold amounts: beginning at \$75,000 in AGI for single filers. This increases the effective marginal tax rate relative to the statutory rate.

Table 2: Effect on income of a hypothetical progressive income tax

Gro	oss In (1)	come	Statutory Marginal Tax Rate (2)	Addditional Tax Paid (3)	Cumulative Tax Paid (4)	Additional After-Tax Net Income (5)	Cumulative After-Tax Net Income (6)	Effective Average Tax Rate (7)
\$0	-	\$10,000	5%	\$500	\$500	\$9,500	\$9,500	5.0%
\$10,001	-	\$20,000	10%	\$1,000	\$1,500	\$9,000	\$18,500	7.5%
\$20,001	-	\$30,000	15%	\$1,500	\$3,000	\$8,500	\$27,000	10.0%
\$30,001	-	\$40,000	20%	\$2,000	\$5,000	\$8,000	\$35,000	12.5%
\$40,001	-	\$50,000	25%	\$2,500	\$7,500	\$7,500	\$42,500	15.0%
\$50,001	-	\$60,000	30%	\$3,000	\$10,500	\$7,000	\$49,500	17.5%
\$60,001	-	\$70,000	35%	\$3,500	\$14,000	\$6,500	\$56,000	20.0%
\$70,001	-	\$80,000	40%	\$4,000	\$18,000	\$6,000	\$62,000	22.5%
\$80,001	-	\$90,000	45%	\$4,500	\$22,500	\$5,500	\$67,500	25.0%
\$90,001	-	\$100,000	50%	\$5,000	\$27,500	\$5,000	\$72,500	27.5%

Source: Primer on the Economic Effects of Marginal Tax Rates, Tax Foundation, p. 19.

Table 2 shows the effect of a hypothetical progressive income tax on after-tax income -- that the amount of taxes paid increases faster than income. The increasing marginal tax brackets reduce after-tax net income as gross income increases (notice that column 5 decreases as income increases). As a result, the effective average tax rate increases with the rising income (see column 7).

Also notice that the effective average tax rate in column 7 (column 4 divided by the maximum income for that bracket in column 1) is less than the marginal rate. So a taxpayer making over \$100,000 would pay 50% of his next dollar earned in taxes but his average tax rate would only be 27.5%. It is the marginal rate that will influence the taxpayer's decision to work and earn more, work more and take nonmonetary compensation instead, or to go fishing because he has to split that next dollar earned with the government.

It is not necessary to have graduated tax rates to achieve progressivity. A tax which exempts some amount of income at the bottom and imposes a flat marginal tax rate on income above that amount is progressive because the average tax rate rises with income. The FairTax exempts spending up to the poverty level (by means of the FairTax prebate) and imposes a 23% statutory rate on all spending above the poverty level. While all consumers would pay the same tax rate on their purchases, because of the prebate, the effective average tax rate differs for persons at different levels of spending. The effective average tax rate increases as consumption increases making the FairTax a progressive tax. A person spending at the poverty level has an effective average tax rate of 0.0%, whereas someone spending at 4 times the poverty level has an effective average tax rate of 17.2%.

Table 3: FairTax progressive rate structure

	Married Couple: Two Children						
Percent of Poverty Level	Spending	FairTaxes Paid	Amount of Rebate	Net Taxes Paid	Effective Average Tax Rate		
25%	7,285	1,676	6,702	-5,026	-69.00%		
50%	14,570	3,351	6,702	-3,351	-23.00%		
100%	29,140	6,702	6,702	0	0.00%		
150%	43,710	10,053	6,702	3,351	7.70%		
200%	58,280	13,404	6,702	6,702	11.50%		
300%	87,420	20,107	6,702	13,405	15.30%		
400%	116,560	26,809	6,702	20,107	17.20%		

Source: The Prebate Explained, www.fairtax.org.

What is the FairTax Plan?

The FairTax Plan is a comprehensive proposal that replaces all federal income and payroll taxes with an integrated approach including a progressive national retail sales tax, a rebate to ensure no American pays federal taxes on spending up to the poverty level, dollar-for-dollar federal revenue replacement, and, through companion legislation, repeal of the 16th Amendment. This nonpartisan legislation (HR 25) abolishes all federal personal, gift, estate, capital gains, alternative minimum, Social Security, Medicare, self-employment, and corporate taxes and replaces them with one simple, visible, federal retail sales tax – collected by existing state sales tax authorities. The FairTax

taxes us only on what we choose to spend, not on what we earn. It does not raise any more or less revenue; it is designed to be revenue neutral. The FairTax is a fair, efficient, transparent, and intelligent solution to the frustration and inequity of our current tax system.

What is Americans For Fair Taxation (FairTax.org)?

FairTax.org is a nonprofit, nonpartisan, grassroots organization dedicated to replacing the current tax system. The organization has hundreds of thousands of members and volunteers nationwide. Its plan supports sound economic research, education of citizens and community leaders, and grassroots mobilization efforts. For more information visit the Web page: www.FairTax.org or call 1-800-FAIRTAX.

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