



Adjustments to Convert Reported Net Income to NOPAT

This backtest data set contains the adjustments we make to convert reported net income to [NOPAT \(Net Operating Profit After Tax\)](#). This data set contains point-in-time data. See below.

This data is available through our [API](#) in the [Net Income to NOPAT Reconciliation endpoint](#). Historical data provided through the API is best-available data as of today, not the point-in-time data presented in this backtest data set.

Backtest Dataset General Information

See our [detailed documentation](#) explaining the fields in a backtest dataset file.

Economic Rationale for NOPAT - Why NOPAT Matters

NOPAT represents the unlevered, normalized, recurring after-tax cash flows of the business. Also known as NOPLAT, NOPAT is the numerator in the return on invested capital calculation ([ROIC](#)), which is considered the most robust measure of profitability by fundamental researchers. We did not invent NOPAT. While the NOPAT concept has been part of fundamental research for decades, it has failed to enter more mainstream areas of equity research because of the difficulty in calculating it consistently and accurately across large numbers of companies. Our [Robo Analyst technology](#) allows us to scale the most sophisticated calculation of NOPAT across thousands of companies. More [details](#).

Reported Net Income to NOPAT Adjustment Calculation

In general, we make 8 types of adjustment to convert reported Net Income to NOPAT:

Reported GAAP Net Income

- + Total Net Non-Operating Expense Hidden in Operating Earnings
- + Reported Net Non-Operating Expense
- + Change in Total Reserves
- + Goodwill Amortization
- ESO Expense (Employee Stock Options)
- + Interest for PV of Operating Leases
- + Non-Operating Tax Adjustment
- + Net After-Tax Non-Operating Expense/(Income)
- = **NOPAT (Net Operating Profit After Tax)**

Total Net Non-Operating Expense Hidden in Operating Earnings are the net of losses and gains that do not appear directly on the income statement. These items are bundled inside other line items that appear on the income statement. Hidden items are found only in the Management Discussion & Analysis (MD&A) or in the footnotes to the financial statements. An example of a Hidden Non-Operating Expense is a non-recurring acquisition integration charge that is bundled into selling, general, and administrative (SGA) expense on the income statement and is disclosed only in a footnote detailing the acquisition. More [details](#).



Reported Net Non-Operating Expense are the net of non-operating charges and gains that appear directly on the income statement. An example of a Reported Non-Operating Expenses is a restructuring charge that appears directly on the income statement. We present the net of non-operating expenses less non-operating charges. More [details](#).

Change in Total Reserves captures changes in LIFO reserves, other inventory reserves, and loan loss reserves. More [details](#).

Goodwill Amortization is a gradual, formulaic reduction in goodwill asset value using any of the several GAAP amortization methods. In 2002, FASB did away with Goodwill amortization and replaced it with the practice of goodwill impairment. This adjustment only appears in historical filings prior to adoption of the new accounting standards. More [details](#).

Unrecorded Employee Stock Options Expense is the cost of issuing (at-the-money) employee stock options (ESOs) to employees before companies were required to expense ESOs. Prior to 2006, businesses were not required to record any cost for issuing ESOs. Using data provided only in footnotes, we charge companies for the cost of all ESO issuances long before FASB required companies to report the expense. This charge only appears in historical filings prior to adoption of the new accounting standards. More [details](#).

Interest for PV of Operating Leases is the implied interest expense added back to NOPAT for the capitalization of operating leases, a form of off-balance sheet debt. As of 2019, FASB requires [operating leases to be on balance sheet](#). In the meantime, we capitalize all operating leases to make them like capital leases to ensure apples-to-apples comparability between companies employing different accounting techniques (i.e. capital leases vs operating leases) for the same economic activity. More [details](#).

The Non-Operating Tax Adjustment normalizes the reported income tax provision and accounts for the effects of non-operating items and deferred taxes. [More details](#).

Net After-Tax Non-Operating Expense/(Income) are the net of non-operating expenses and income that appear directly on the income statement after tax. An example of a Non-Operating After-Tax Expense is an after-tax charge for preferred dividends that is reported below the income tax provision. More details.

Data Value Data Fields - The following data fields are columns in the data set. All values are reported in ones units.

Datapoints that are impacted by stock price changes are marked with an asterisk (*) in the table below.

Basic Reported Net Income to NOPAT Adjustments

Name	Datapoint	Example (AAP 2004)
GAAP Net Income	INCOME_NET	\$187,988,000
Total Net Non-Operating Expense Hidden in Operating Earnings	EXPENSES_PRE_TAX_HIDDEN_TOTAL	\$1,265,000



Reported Net Non-Operating Expense	EXPENSES_NON_OPERATING	\$23,010,000
Change in Total Reserves	RESERVES_YOY_DELTA	-\$5,294,000
Goodwill Amortization	GOODWILL_AMORTIZATION_ADJUSTED	\$0
ESO Expense (Employee Stock Options)	ESO_EXPENSE	\$14,265,352
Interest for PV of Operating Leases	LEASES_OPERATING_OBLIGATION_INTEREST_IMPLIED	\$52,886,828
Non-Operating Tax Adjustment	NON_OPERATING_TAXES	-\$24,393,869
Net After-Tax Non-Operating Expense/(Income)	CHARGE_AFTER_TAX	\$39,000
NOPAT (Net Operating Profit After Tax)	NOPAT	\$221,235,607
NOPAT (Net Operating Profit After Tax) Financing Approach	NOPAT_FINANCING	\$221,235,607



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Accounting data is only the beginning of fundamental research. It must be translated into economic earnings to truly understand profitability and valuation. This translation requires deep analysis of footnotes and the MD&A, a process that our [robo-analyst technology](#) empowers us to perform for thousands of stocks, ETFs and mutual funds.



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