

**UNITED STATES
SECURITIES AND EXCHANGE COMMISSION
WASHINGTON, D.C. 20549**

FORM 11-K

(Mark One)

- ANNUAL REPORT PURSUANT TO SECTION 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**
For the fiscal year ended December 31, 2016

OR

- TRANSITION REPORT PURSUANT TO SECTION 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**
For the transition period from _____ to _____

Commission file number: 000-6920

Applied Materials, Inc. Employee Savings and Retirement Plan

(Full title of the plan)

APPLIED MATERIALS, INC.

3050 Bowers Avenue, P.O. Box 58039

Santa Clara, California 95052-8039

(Name of issuer of the securities held pursuant to the plan and the address of the issuer's and plan's principal executive office)

**APPLIED MATERIALS, INC.
EMPLOYEE SAVINGS AND RETIREMENT PLAN**

Table of Contents

	<u>Page number</u>
Report of Independent Registered Public Accounting Firm	1
Financial Statements:	
Statements of Net Assets Available for Benefits as of December 31, 2016 and 2015	2
Statement of Changes in Net Assets Available for Benefits for the Year Ended December 31, 2016	3
Notes to Financial Statements	4
Supplementary Information:	
Schedule H, Part IV, Line 4i - Schedule of Assets (Held at End of Year) as of December 31, 2016	14
Signature	16
Exhibit Index	17

REPORT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

To the Participants and Administrative Committee of the
Applied Materials, Inc. Employee Savings and Retirement Plan
Santa Clara, California

We have audited the accompanying statements of net assets available for benefits of the Applied Materials, Inc. Employee Savings and Retirement Plan (the "Plan") as of December 31, 2016 and 2015, and the related statement of changes in net assets available for benefits for the year ended December 31, 2016. These financial statements are the responsibility of the Plan's management. Our responsibility is to express an opinion on these financial statements based on our audits.

We conducted our audits in accordance with the standards of the Public Company Accounting Oversight Board (United States). Those standards require that we plan and perform the audits to obtain reasonable assurance about whether the financial statements are free of material misstatement. The Plan is not required to have, nor were we engaged to perform, an audit of the internal control over financial reporting. Our audits included consideration of internal control over financial reporting as a basis for designing audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the Plan's internal control over financial reporting. Accordingly, we express no such opinion. An audit also includes examining, on a test basis, evidence supporting the amounts and disclosures in the financial statements, assessing the accounting principles used and significant estimates made by management, and evaluating the overall financial statement presentation. We believe that our audits provide a reasonable basis for our opinion.

In our opinion, the financial statements referred to above present fairly, in all material respects, the net assets available for benefits of the Plan as of December 31, 2016 and 2015, and the changes in net assets available for benefits for the year ended December 31, 2016 in conformity with accounting principles generally accepted in the United States of America.

The supplemental information in the accompanying schedule of assets (held at end of year) as of December 31, 2016 has been subjected to audit procedures performed in conjunction with the audit of the Plan's financial statements. The supplemental information is presented for the purpose of additional analysis and is not a required part of the financial statements but includes supplemental information required by the Department of Labor's Rules and Regulations for Reporting and Disclosure under the Employee Retirement Income Security Act of 1974. The supplemental information is the responsibility of the Plan's management. Our audit procedures included determining whether the supplemental information reconciles to the financial statements or the underlying accounting and other records, as applicable, and performing procedures to test the completeness and accuracy of the information presented in the supplemental information. In forming our opinion on the supplemental information in the accompanying schedule, we evaluated whether the supplemental information, including its form and content, is presented in conformity with the Department of Labor's Rules and Regulations for Reporting and Disclosure under the Employee Retirement Income Security Act of 1974. In our opinion, the supplemental information in the accompanying schedule is fairly stated in all material respects in relation to the financial statements as a whole.

ARMANINO^{LLP}
San Francisco, California

June 22, 2017

APPLIED MATERIALS, INC.
EMPLOYEE SAVINGS AND RETIREMENT PLAN
STATEMENTS OF NET ASSETS AVAILABLE FOR BENEFITS

	December 31, 2016	December 31, 2015
	(In thousands)	
ASSETS		
Investments, at fair value		
Mutual funds	\$ 625,379	\$ 545,776
Applied common stock	346,870	277,594
Common/collective trusts	1,025,467	931,673
Unitized stock funds	137,515	113,058
	<u>2,135,231</u>	<u>1,868,101</u>
Guaranteed investment contracts, at contract value	268,816	217,382
	<u>2,404,047</u>	<u>2,085,483</u>
Total investments	2,404,047	2,085,483
Receivables:		
Notes receivable from participants	21,078	20,466
Employer contribution receivable	2,526	2,335
Total receivables	<u>23,604</u>	<u>22,801</u>
Total assets	<u>2,427,651</u>	<u>2,108,284</u>
LIABILITIES		
Expenses payable	(236)	(172)
Total liabilities	<u>(236)</u>	<u>(172)</u>
Net assets available for benefits	<u>\$ 2,427,415</u>	<u>\$ 2,108,112</u>

See accompanying notes to financial statements.

APPLIED MATERIALS, INC.
EMPLOYEE SAVINGS AND RETIREMENT PLAN
STATEMENT OF CHANGES IN NET ASSETS AVAILABLE FOR BENEFITS

	Year ended December 31, 2016
	(In thousands)
Additions to net assets attributed to:	
Investment and other income:	
Net realized and unrealized appreciation in the fair value of investments	\$ 295,898
Dividends and interest	21,759
Total investment and other income	317,657
Contributions:	
Participant	84,001
Rollovers	10,259
Employer	37,007
Total contributions	131,267
Withdrawals, distributions and expenses	(129,621)
Net increase in net assets	319,303
Net assets available for benefits:	
Beginning of year	2,108,112
End of year	\$ 2,427,415

See accompanying notes to financial statements.

APPLIED MATERIALS, INC.
EMPLOYEE SAVINGS AND RETIREMENT PLAN
NOTES TO FINANCIAL STATEMENTS

Note 1 - Significant accounting policies

General

The following description of the Applied Materials, Inc. (Applied) Employee Savings and Retirement Plan (the Plan) provides only general information. Participants seeking more detailed information about the Plan should refer to the Plan document and the Summary Plan Description/Prospectus for the Plan.

The Plan is a defined contribution plan that Applied established in 1981 to provide benefits to eligible employees, as provided in the Plan document. The Plan covers all eligible United States and certain expatriate employees of Applied and its participating affiliates. Eligible employees may enroll in the Plan after receipt of their first paycheck.

The Plan is intended to qualify as a profit-sharing plan as described in Section 401(a) of the Internal Revenue Code of 1986 (the Code), which includes a qualified cash or deferred arrangement as described in Section 401(k) of the Code. In addition, the Applied Materials, Inc. Common Stock Fund under the Plan (the Stock Fund) is intended to constitute an employee stock ownership plan as described in Section 4975(e)(7) of the Code. The Plan is also intended to comply with the provisions of the Employee Retirement Income Security Act of 1974 (ERISA).

Plan administration

Under ERISA, Applied is the designated administrator of the Plan. An administrative committee (the 401(k) Committee) and its authorized delegates manage the day-to-day operation and administration of the Plan on behalf of Applied. The 401(k) Committee members consist of certain Applied employees who do not report directly to Applied's Chief Executive Officer, as specified in the Plan. Applied has contracted with Fidelity Institutional Retirement Services Company (Fidelity) to maintain the Plan's individual participant accounts and provide certain other recordkeeping and administrative services, and with Fidelity Management Trust Company (Fidelity Trust) to act as the Plan's custodian and trustee. Applied currently pays a portion of the expenses incurred in the administration of the Plan. Other expenses associated with the administration of the Plan are charged against the Plan and paid from Plan assets. Fees related to the administration of notes receivable from participants are charged directly to the respective participant's account and are included in administrative expenses. Effective January 1, 2016, Plan participants pay an annual flat fee (deducted quarterly from their accounts in the Plan) for the Plan's cost of recordkeeping. Withdrawal fees are paid by Plan participants who elect to receive certain types of withdrawals. Fees are also paid by Plan participants who request overnight mail of documents or review of a qualified domestic relations order.

Brokerage commission fees associated with transactions in the Stock Fund are paid by Plan participants who transact in the Stock Fund. Gross total administrative expenses amounted to \$905 thousand and \$388 thousand in 2016 and 2015, respectively. These amounts were reduced by \$254 thousand and \$113 thousand, respectively, as a result of revenue sharing credits that the Plan received. These fees are insignificant to these financial statements, and are therefore reported as withdrawals. Other brokerage commissions and other charges incurred in connection with investment transactions under the Plan are paid from Plan assets and are included as a reduction in investment income.

Estimates

The preparation of financial statements in conformity with accounting principles generally accepted in the United States of America (U.S. GAAP) requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities, and changes therein, and the disclosure of contingent assets and liabilities. Actual results could differ from those estimates.

Basis of accounting

The financial statements of the Plan are prepared using the accrual method of accounting. Participant contributions and Applied matching contributions are recorded in the period during which Applied withholds the applicable payroll deductions from participants' eligible earnings. Benefits are recorded when paid.

Plan year

The Plan year is the twelve-consecutive month period beginning each January 1 and ending December 31.

Investments

Plan assets are held in trust by Fidelity Trust and are invested in the investment options available under the Plan based solely upon instructions received from Plan participants or as provided in the Plan document. Except as described below, the Plan's investments are valued at fair value, as measured by quoted market prices, as of the last business day of the Plan year. Purchases and sales of securities are recorded on a trade-date basis and dividends are recorded on the ex-dividend date.

The BNY Mellon Stable Value Fund (the Stable Value Fund) is a separate account that holds investments solely for the benefit of the Plan participants. The Stable Value Fund holds a short term investment fund and fixed maturity and constant duration synthetic guaranteed investment contracts (GICs). The investments in synthetic GICs are presented at contract value.

In determining the net assets available for benefits, synthetic GICs are recorded at their contract values, which are equal to principal balance plus accrued interest. An investment contract is generally valued at contract value which represents contributions made under the contract, plus earnings, less participant withdrawals and administrative expenses. Participants may ordinarily direct the withdrawal or transfer of all or a portion of their investment at contract value.

Certain employer initiated events (e.g., layoffs, bankruptcy, plant closings, plan termination, mergers, early retirement incentives, employer communications designed to induce participants to transfer from the Stable Value Fund, competing fund transfer or violation of equity wash or equivalent rules in place and changes of qualification status of the employer or the Plan) are not eligible for book value disbursements even from fully benefit-responsive contracts. These events may cause liquidation of all or a portion of a synthetic GIC at a market value adjustment. If the likelihood of such a non-book value withdrawal event is imminent, it may be necessary to consider revaluation of those particular synthetic GICs. In general, synthetic GIC issuers may terminate the contract and settle at other than contract value if the qualification status of the employer or the Plan changes, or there is a breach of material obligations under the contract or misrepresentation of the contract holder, or failure of the underlying portfolio to conform to the pre-established investment guidelines.

The Stable Value Fund was made up of the following investment types at December 31, 2016 and 2015:

	December 31, 2016	December 31, 2015
	(In thousands)	
Investment type:		
Short term investment fund	\$ 16,817	\$ 10,402
Fixed maturity synthetic GICs	35,711	29,622
Constant duration synthetic GICs	216,288	177,358
	<u>\$ 268,816</u>	<u>\$ 217,382</u>

The short term investment fund is made up of cash, a portfolio of U.S. Government securities and/or repurchase agreements that are collateralized fully by either cash or government securities.

Generally, fixed maturity synthetic GICs consist of an asset or collection of assets that are owned by the Plan and a benefit-responsive, book value wrap contract. The wrap contract provides book value accounting for the asset and assures that book value, benefit-responsive payments will be made for participant-directed withdrawals. The crediting rate for the wrap contract is set at the beginning of the wrap contract period and typically resets every quarter. Generally, fixed maturity synthetic GICs are held to maturity. The initial crediting rate is established based on market interest rates at the time the initial asset is purchased.

Generally, constant duration synthetic GICs consist of a portfolio of securities owned by the Plan and a benefit-responsive, book value wrap contract. The wrap contract amortizes gains and losses of the underlying securities over the contract duration, and assures that book value, benefit-responsive payments are made for participant-directed withdrawals. The crediting rate on a constant duration synthetic GIC resets every quarter based on the book value of the contract and the market value of the underlying securities over the duration of the contract and therefore will be affected by movements in interest rates and changes in the market value of the underlying securities. The initial crediting rate is established based on market interest rates at the time the underlying portfolio of securities is put together.

The Stable Value Fund is credited with earnings on the underlying investments and charged for participant withdrawals and administrative expenses. The synthetic GICs issuers are contractually obligated to repay the principal and a specified interest rate that is guaranteed to the Plan.

Notes receivable from participants

Notes receivable from participants (notes receivable) are measured at their unpaid principal balance plus any accrued but unpaid interest. Delinquent notes receivable are reclassified as distributions upon the occurrence of a distributable event based upon the Plan's terms.

Income taxes

The Plan is intended to qualify for favorable federal and state income tax treatment accorded to plans that qualify under Section 401(a) of the Code, and therefore is intended to be exempt from federal income and state franchise taxes. The Plan has been amended subsequent to receipt of its most recent Internal Revenue Service (IRS) favorable determination letter dated September 24, 2013. The 401(k) Committee continues to believe that the Plan is currently designed and being operated in compliance with the applicable requirements of the Code. Therefore, no provision for income taxes has been included in the Plan's financial statements.

U.S. GAAP requires the Plan's management to evaluate tax positions taken by the Plan and recognize a tax liability (or asset) if the Plan has taken an uncertain position that more likely than not would not be sustained upon an examination by the IRS. No uncertain positions have been identified that would require the recognition of a tax liability (or asset) or disclosure in the financial statements as of December 31, 2016 and 2015. The Plan is subject to routine audits by applicable taxing jurisdictions; however, there are currently no audits for any tax periods in progress.

Risks and uncertainties

The Plan provides participants with investment options consisting of various mutual funds, common/collective trusts, separate accounts and the Stock Fund (which invests solely in shares of Applied common stock (Shares)). The mutual funds, common/collective trust and separate accounts offered under the Plan invest in stocks, bonds and other investment securities. Shares and other investment securities are exposed to risks, such as those associated with interest rates, market conditions and credit worthiness of the securities' issuers. These risks could materially affect participants' Plan account balances and the amounts reported in these financial statements.

Note 2 - Fair value measurements

The fair value measurements standard establishes a framework for measuring fair value. That framework provides a hierarchy that prioritizes the inputs to valuation techniques used to measure fair value. The hierarchy gives the highest priority to unadjusted quoted prices in active markets for identical assets or liabilities (Level 1 measurements) and the lowest priority to unobservable inputs (Level 3 measurements). The three levels of the fair value hierarchy under the standard are described below:

Level 1 - Quoted market prices for identical assets or liabilities that the Plan has the ability to access.

Level 2 - Inputs other than Level 1 that are observable, either directly or indirectly, such as quoted prices for similar assets or liabilities, quoted prices in markets that are not active, or other inputs that are observable or can be corroborated by observable market data for substantially the full term of the assets or liabilities.

Level 3 - Unobservable inputs that are supported by little or no market activity and that are significant to the fair value of the assets or liabilities.

The asset's or liability's fair value measurement level within the fair value hierarchy is based on the lowest level of any input that is significant to the fair value measurement. Valuation techniques should maximize the use of observable inputs and minimize the use of unobservable inputs.

The following is a description of the valuation methodologies used for fair value measurements of the Plan's investments. There have been no changes in the methodologies used at December 31, 2016 and 2015.

Mutual funds and shares in the Stock Fund are valued at the closing price reported on the active market on which these securities are traded.

The Fidelity Institutional Asset Management Core Plus Commingled Pool Class F Fund, the Fidelity Growth Company Commingled Pool, the Fidelity Contrafund Commingled Pool, the T. Rowe Price Growth Stock Trust Class B, the Vanguard Target Retirement Income Trust II Fund and the various Vanguard Target Retirement Date Trust II funds, classified as common/collective trusts, are valued using their respective net asset value (NAV) practical expedient provided by the managers of the funds. The NAV practical expedient is based on the value of the underlying net assets owned by the applicable fund divided by the number of shares outstanding. These investments are not available in an exchange and active market, however, the fair values are determined based on the underlying investments as traded in an exchange and active market.

The Silvercrest Asset Management Small Cap Value Account and Fidelity Equity Income Unitized K Fund are classified as unitized common stock funds that are valued using the NAV practical expedient provided by the manager of the funds. These investments are not available in an exchange and active market, however, the fair values are determined based on the underlying investments as traded in an exchange and active market.

The valuation methodologies described above may produce a fair value calculation that may not be indicative of net realizable value or reflective of future fair values. Furthermore, while the Plan administrator believes the valuation methodologies used are appropriate and consistent with other market participants, the use of different methodologies or assumptions to determine the fair value of certain financial instruments could result in a different fair value measurement at the reporting date.

There were no transfers between the three fair value hierarchies during the years ended December 31, 2016 and 2015.

The following tables set forth by level, within the fair value hierarchy, the Plan's assets at estimated fair value as of December 31, 2016 and 2015:

	Assets at fair value as of December 31, 2016		
	Level 1	Level 2	Total
	(In thousands)		
Mutual funds	\$ 625,379	\$ —	\$ 625,379
Applied common stock	346,870	—	346,870
Total assets at fair value	<u>\$ 972,249</u>	<u>\$ —</u>	<u>\$ 972,249</u>
Investments measured at NAV practical expedient *			1,162,982
Investments at fair value			<u>\$ 2,135,231</u>

	Assets at fair value as of December 31, 2015		
	Level 1	Level 2	Total
	(In thousands)		
Mutual funds	\$ 545,776	\$ —	\$ 545,776
Applied common stock	277,594	—	277,594
Total assets at fair value	<u>\$ 823,370</u>	<u>\$ —</u>	<u>\$ 823,370</u>
Investments measured at NAV practical expedient *			1,044,731
Total assets at estimated fair value			<u>\$ 1,868,101</u>

* In accordance with subtopic 820-10, certain investments that were measured at NAV practical expedient have not be classified in the fair value hierarchy. The fair value amounts presented in this table are intended to permit reconciliation of the fair value hierarchy to the line items presented in the statement of net assets available for benefits.

Fair value of investments in entities that use NAV as a practical expedient

The following table summarizes investments measured at fair value using NAV as a practical expedient per share as of December 31, 2016 and 2015, respectively.

	As of December 31, 2016			
	Fair Value (in thousands)	Unfunded Commitments	Redemption Frequency (if currently eligible)	Redemption Notice Period
Vanguard Target Retirement Income Trust II funds	\$ 496,432	N/A	Daily	None
Fidelity Growth Company Commingled Pool	89,684	N/A	Daily	Various **
Fidelity Contrafund Commingled Pool	182,334	N/A	Daily	Various **
T. Rowe Price Growth Stock Trust Class B	144,782	N/A	Daily	30 days
Fidelity Institutional Asset Management Core Plus Commingled Pool Class F	112,235	N/A	Daily	Various **
Fidelity Equity Income Unitized K Fund	83,868	N/A	Daily	Various **
Silvercrest Asset Management Small Cap Value Account	53,647	N/A	Daily	None

As of December 31, 2015

	Fair Value (in thousands)	Unfunded Commitments	Redemption Frequency (if currently eligible)	Redemption Notice Period
Vanguard Target Retirement Income Trust II funds	\$ 385,253	N/A	Daily	None
Fidelity Growth Company Commingled Pool	96,137	N/A	Daily	Various **
Fidelity Contrafund Commingled Pool	198,784	N/A	Daily	Various **
T. Rowe Price Growth Stock Trust Class B	159,032	N/A	Daily	30 days
Fidelity Institutional Asset Management Core Plus Commingled Pool Class F	92,467	N/A	Daily	Various **
Fidelity Equity Income Unitized K Fund	73,144	N/A	Daily	Various **
Silvercrest Asset Management Small Cap Value Account	39,914	N/A	Daily	None

** Large cash flows require discussion with fund managers concerning dates and amounts of cash flows

Note 3 - Participation and benefits

Participant contributions

The Plan allows eligible participants to elect to have Applied withhold up to 50% of their eligible compensation each payroll period for contribution to the Plan on a pre-tax basis (salary deferral contributions) and/or on a Roth basis (Roth deferral contributions), subject to an annual dollar limit established by the Code. The Plan also allows eligible participants who are age 50 or older during the Plan year to make additional catch-up contributions up to 50% of their eligible compensation each payroll period during the year on a pre-tax and/or Roth basis, subject to an annual dollar limit established by the Code.

Salary deferral contributions are contributions of an eligible participant's eligible compensation that are not taxable to the participant for federal (and most state) income tax purposes at the time they are contributed to the Plan, but are generally taxable as ordinary income, along with any earnings on them, when distributed from the Plan. Roth deferral contributions are contributions of an eligible participant's eligible compensation that are made on an after-tax basis for federal (and most state) income tax purposes. Roth deferral contributions generally will be distributed from the Plan tax free and, if certain requirements are met, any earnings on them can be distributed from the Plan tax free. Effective January 1, 2016, the Plan allows eligible participants to make after-tax contributions up to 25% (as determined by the 401(k) Committee) of their eligible compensation each payroll period during the year, subject to limits established by the Code.

Participants are also allowed to make rollover contributions of eligible amounts received from other eligible employer plans or eligible individual retirement accounts, as set forth in the Plan. Effective January 1, 2016, the Plan allows eligible participants to convert certain eligible non-Roth accounts to Roth accounts within the Plan.

Employees who are newly-hired or rehired as eligible employees or who transfer to eligible employee status automatically are enrolled in the Plan at a 6% salary deferral contribution rate, effective as soon as administratively practicable after the end of the 60-day period following the date of their hire/rehire or transfer to eligible employee status, unless they elect otherwise within that 60-day period in accordance with the Plan's procedures.

Applied's matching contributions

Participants in the Plan become eligible to receive Applied's matching contributions immediately upon their enrollment and election (or deemed election) to make contributions to the Plan.

Applied matches 100% of participant salary deferral and/or Roth deferral contributions (collectively, 401(k) contributions) up to the first 3% of eligible compensation contributed each payroll period and then 50% of every dollar between 4% and 6% of eligible compensation contributed each payroll period. Applied does not make matching contributions on any after-tax or catch-up contributions made by participants.

In addition, Applied makes a special annual "reconciling match" contribution designed to maximize the amount of matching contributions that eligible participants may receive under the Plan. Participants are eligible for the reconciling match contribution for a Plan year if they are employed by Applied or one of its affiliates on the last day of the Plan year or they ceased to be so employed solely due to death or qualifying disability. After the end of the Plan year, an eligible participant's total matching contributions for that year will be recalculated on an annual basis using the matching contribution formula in effect for that Plan year. Any difference between this amount and the matching contributions previously contributed on his or her behalf on a pay period basis is contributed subsequent to year end and is accrued as an employer contribution receivable on the Statements of Net Assets Available for Benefits.

Applied may change the matching contribution rate at any time, subject to the limits of the Plan and the Code. Applied's matching contributions (if any) are made in the form of cash.

Participant accounts

Each participant's account is credited with the participant's contributions; his or her portion of Applied's matching contributions (if any) and any investment earnings or losses thereon.

Investment direction

The Plan allows participants (or their beneficiaries) to direct the investment of their Plan account balances in any of the investment options available under the Plan.

Prior to December 31, 2015, participants could invest no more than 20% of their future contributions in the Stock Fund and could make an exchange into the Stock Fund only to the extent it does not result in more than 20% of their total Plan account balances being invested in the Stock Fund (determined at the time of the exchange). See Note 4.

If a participant fails to choose an investment option for the contributions to his or her Plan account, such funds automatically are invested in the Plan's default fund (the Default Fund) until the participant selects a different investment option available under the Plan. The Default Fund is the designated Vanguard Target Retirement Trust II fund with a target retirement date closest to the year in which the participant might retire, based on his or her date of birth and assuming a retirement age of 65 (the Applicable Target Date). In the case of any future cash dividends that are payable with respect to Shares held in the Stock Fund, if a participant has not made an affirmative election to either have the dividends reinvested in the Stock Fund or paid directly to him or her in cash before the dividend payment date, then the dividends automatically are reinvested in the Stock Fund.

Participants may change their investment elections under the Plan generally at any time, in accordance with the procedures established by the 401(k) Committee and Fidelity Trust.

Payment of benefits

Upon a Plan participant's termination of employment with Applied and all of its affiliates, the participant (or his or her beneficiary) may elect to receive a lump-sum cash distribution of his or her vested account balance. A terminated participant (or beneficiary) may also elect to receive whole shares for any portion of his or her vested account balance that is invested in the Stock Fund. A terminated participant whose account balance under the Varian Semiconductor Equipment Associates, Inc. (Varian) Retirement Plan (the Varian Plan) was transferred to the Plan upon the merger of the Varian Plan with and into the Plan, (effective as of market close on December 31, 2012), may also generally elect to receive a distribution of his or her vested transferred Varian Plan account balance in the form of "on demand" withdrawals. Participants with vested account balances from certain other plans that merged into the Plan from time to time also have certain additional withdrawal and distribution options.

In accordance with applicable laws and the Plan's terms, a distribution of a Plan participant's vested account balance must be made or commenced no later than the April 1 immediately following the calendar year in which he or she attains age 70.5 or terminates employment with Applied and all of its affiliates, whichever is later. A participant's beneficiary must receive a distribution of the participant's entire vested account balance no later than the December 31 of the year that includes the fifth anniversary of the date of the participant's death.

Notwithstanding the foregoing, if a terminated participant's (or beneficiary's) vested account balance is equal to or less than \$1 thousand, a lump-sum payment of the vested account balance automatically will be distributed.

In accordance with the Plan's terms, a participant may receive an in-service withdrawal from certain portions of his or her vested account balance upon financial hardship (as defined in the Plan) or attainment of age 59.5, and from his or her rollover contributions account. A participant who receives a financial hardship withdrawal will be: (1) suspended from active participation in the Plan, (2) prohibited from exercising any option for Shares granted under an Applied-sponsored plan or participating in Applied's Employees' Stock Purchase Plan, and (3) generally suspended from making any other elective or employee contributions under any other plan maintained by Applied or its affiliates, for a period of at least six months following the withdrawal.

Distributions and withdrawals from the Plan are subject to any applicable taxes and/or penalties.

Notes receivable from participants

The Plan allows active participants to borrow from their eligible account balances up to the lesser of the following: (1) \$50 thousand, less their highest outstanding notes receivable balance under the Plan and any other similar plan of any Applied affiliate during the previous 12 months, or (2) 50% of their vested account balances (including the vested portion of Applied's matching contributions). Notes receivable are secured by the participants' vested balances, and generally must be repaid to the Plan from bi-weekly payroll deductions over the term, which is generally a minimum of one year and a maximum of five years. Effective January 1, 2013, loans used by a participant for the purchase of his or her principal residence may have a term up to fifteen years. In addition, the interest rate charged at the time of the borrowing increased from the prime rate plus one percent to the prime rate plus two percent. Notes receivable may generally continue to be repaid through a monthly payment schedule upon a participant's termination of employment from Applied and all of its affiliates, or the occurrence of certain other events. Specific notes receivable terms and conditions are established by the 401(k) Committee or its authorized delegates. Outstanding notes receivable at December 31, 2016 carry interest rates ranging from 4.25% to 9.25% maturing through 2031.

Vesting

Participants are 100% vested in their 401(k) contributions, catch-up and/or any after-tax rollover contributions under the Plan, and any related earnings thereon.

Participants who are employed by Applied or any of its affiliates on or after January 1, 2010 are 100% vested in their Applied matching contribution account balances. Participants who terminated employment with Applied and its affiliates before January 1, 2010 and had two years of credited service as defined by the Plan became vested 20% each year in Applied's matching contributions (if any) allocated to their accounts, and became fully vested after six years of credited service. Former employees of certain acquired companies have different vesting schedules according to the original vesting schedules under their former employer's plan.

Affected participants who are not already fully vested in their Plan account balances will become fully vested upon any termination of the Plan.

If a participant has terminated his or her employment with Applied and its affiliates prior to becoming fully vested, the unvested portion of his or her matching contribution account balance will generally be forfeited. Forfeitures can be used to offset Applied's matching contributions, reinstate any previously forfeited matching contribution balances, and reinstate any closed account balances under the Plan. No forfeitures were used to reduce the employer contributions during the year or to reduce the receivable as of December 31, 2016 and 2015.

As of December 31, 2016 and 2015, forfeited nonvested accounts totaled \$83 thousand and \$123 thousand, respectively. Any forfeitures under the Plan also may be used to pay for Plan administrative expenses.

Note 4 - Party-in-interest and related party transactions

As allowed by the Plan, participants may elect to invest their Plan account balances in the Stock Fund. The Stock Fund invests solely in Shares. Aggregate investment in Shares at December 31, 2016 and 2015 were as follows:

	<u>Number of shares</u>	<u>Fair value</u>
		(In thousands)
2016	10,692,518	\$ 346,870
2015	14,827,987	\$ 277,594

Effective December 31, 2015, the Plan has frozen the Applied Materials, Inc. Common Stock Fund (Stock Fund) option such that no future contributions may be invested in and no exchanges of account balances may be made into the Stock Fund after that time. It is anticipated that the Stock Fund will close to transactions on December 31, 2017. Any remaining shares not sold prior to this date will subsequently be liquidated and invested in the Plan's default investment fund.

Certain Plan investments are managed by Fidelity Trust, the custodian and trustee of the Plan, or its affiliates. Any purchases and sales of these funds are performed in the open market. Such transactions, while considered party-in-interest transactions under ERISA regulations, are permitted under the provisions of the Plan and are specifically exempt from the prohibition of party-in-interest transactions under ERISA.

Note 5 - Non-participant directed investments

As discussed in Note 3, the Plan allows participants (or their beneficiaries) to direct the investment of their account balances in any of the available investment options under the Plan. If a participant fails to choose an investment option for the contributions to his or her Plan account, such funds automatically are invested in the Default Fund until he or she selects a different investment option available under the Plan. In the case of any future cash dividends that are payable with respect to Shares held in the Stock Fund, if a participant (or beneficiary) fails to make an affirmative dividend election before the dividend payment date, the dividends automatically are reinvested in the Stock Fund.

Note 6 - Plan termination or modification

Applied currently intends to continue the Plan indefinitely for the benefit of its participants and their beneficiaries; however, it reserves the right to terminate or modify the Plan at any time and for any reason, subject to the provisions of ERISA. As noted earlier, in the event the Plan is terminated, affected participants who are not already fully vested in their accounts will become fully vested.

Note 7 - Reconciliation of financial statements to Form 5500

The following is a reconciliation of net assets available for benefits per the financial statements at December 31, 2016 and 2015 to Form 5500:

	<u>2016</u>	<u>2105</u>
	(In thousands)	
Net assets available for benefits per the financial statements	\$ 2,427,415	\$ 2,108,112
Adjustment for benefits payable	—	(25)
Net assets available for benefits per Form 5500	<u>\$ 2,427,415</u>	<u>\$ 2,108,087</u>

The following is a reconciliation of the affected component of the changes in net assets available for benefits per the financial statements to total the Form 5500 for the year ended December 31, 2016:

	<u>2016</u>
	<u>(In thousands)</u>
Withdrawals, distributions and expenses per financial statements	\$ 129,621
Adjustment for benefits payable	(25)
Total deductions from net assets per Form 5500	<u>\$ 129,596</u>

**APPLIED MATERIALS, INC. EIN: 94-1655526
EMPLOYEE SAVINGS AND RETIREMENT PLAN (PLAN #333)**

**SUPPLEMENTARY INFORMATION
SCHEDULE H, PART IV, LINE 4i - SCHEDULE OF ASSETS (HELD AT END OF YEAR)
DECEMBER 31, 2016**

(a)	(b) Identity of issue, borrower, lessor or similar party	(c) Description of investment including maturity date, rate of interest, collateral, par or maturity value (1)		(e) Current value (In thousands)
*	Fidelity 500 Index Fund – Institutional Class	2,484,598	shares	\$ 194,668
	Morgan Stanley Institutional Fund, Inc. – International Equity IS Fund	5,306,046	shares	77,681
	American Funds EuroPacific Growth R6 Fund	685,706	shares	30,884
	Eagle Small Cap Growth Fund Class R6	536,926	shares	29,676
	Vanguard Mid-Cap Index Fund – Institutional Plus Shares	987,545	shares	175,299
	Vanguard Small-Cap Index Fund – Institutional Plus Shares	657,232	shares	117,171
		Total mutual funds		\$ 625,379

**APPLIED MATERIALS, INC. EIN: 94-1655526
EMPLOYEE SAVINGS AND RETIREMENT PLAN (PLAN #333)**

**SUPPLEMENTARY INFORMATION
SCHEDULE H, PART IV, LINE 4i - SCHEDULE OF ASSETS (HELD AT END OF YEAR) - Continued
DECEMBER 31, 2016**

(a)	(b) Identity of issue, borrower, lessor or similar party	(c) Description of investment including maturity date, rate of interest, collateral, par or maturity value (1)		(e) Current value (In thousands)
*	Applied Materials, Inc. Common Stock Fund	10,692,518	shares	\$ 346,870
	BNY Mellon Stable Value Fund:			
	Transamerica Insurance Company of America		Guaranteed investment contract	58,480
	Pacific Life Insurance Company		Guaranteed investment contract	53,758
	Prudential Insurance Company of America		Guaranteed investment contract	51,466
	RGA Reinsurance Company		Guaranteed investment contract	52,552
	Nationwide Life insurance Company		Guaranteed investment contract	35,711
*	Fidelity Short Term Investment Fund		Government money market portfolio	16,817
	Net Fund Assets		Other	32
		Total stable value fund holdings		\$ 268,816
*	Fidelity Institutional Asset Management Core Plus Commingled Pool Class F	5,897,791	shares	\$ 112,235
*	Fidelity Growth Company Commingled Pool	6,494,146	shares	89,684
*	Fidelity Contrafund Commingled Pool	15,169,192	shares	182,334
	T. Rowe Price Growth Stock Trust Class B	6,111,519	shares	144,782
	Vanguard Target Retirement Income Trust II	438,837	shares	13,727
	Vanguard Target Retirement 2010 Trust II	182,924	shares	5,286
	Vanguard Target Retirement 2015 Trust II	657,895	shares	19,132
	Vanguard Target Retirement 2020 Trust II	2,111,632	shares	60,878
	Vanguard Target Retirement 2025 Trust II	3,693,679	shares	104,753
	Vanguard Target Retirement 2030 Trust II	3,882,418	shares	107,854
	Vanguard Target Retirement 2035 Trust II	2,915,602	shares	81,170
	Vanguard Target Retirement 2040 Trust II	1,704,717	shares	48,329
	Vanguard Target Retirement 2045 Trust II	916,750	shares	25,999
	Vanguard Target Retirement 2050 Trust II	591,109	shares	16,841
	Vanguard Target Retirement 2055 Trust II	220,456	shares	8,413
	Vanguard Target Retirement 2060 Trust II	134,698	shares	4,050
		Total common/collective trusts		\$ 1,025,467
*	Fidelity Equity Income Unitized K Fund	7,365,137	units	83,868
	Silvercrest Asset Management Small Cap Value Account	3,923,023	units	53,647
		Total unitized stock funds		\$ 137,515
*	Participant loans	Interest at 4.25% to 9.25%, maturing through 2031		\$ 21,078
		Total		\$ 2,425,125

(1) Column (d), cost information, is not provided as all investments are participant or beneficiary directed (including negative elections authorized under the Plan's terms).

* Indicates party-in-interest to the Plan.

SIGNATURE

Pursuant to the requirements of the Securities Exchange Act of 1934, the administrative committee has duly caused this Annual Report to be signed on its behalf by the undersigned hereunto duly authorized.

APPLIED MATERIALS, INC.
EMPLOYEE SAVINGS AND RETIREMENT PLAN

June 22, 2017

By: /s/ Greg Lawler

Greg Lawler

Corporate Vice President, Global Rewards

EXHIBIT INDEX

Exhibit No.	Description
23.1	Consent of Independent Registered Public Accounting Firm

CONSENT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

We consent to the incorporation by reference in the Registration Statements on Form S-8 (No. 333-124711) pertaining to the Applied Materials, Inc. Employee Savings and Retirement Plan, of our report dated June 22, 2017, with respect to the financial statements and supplemental schedule of the Applied Materials, Inc. Employee Savings and Retirement Plan included in this Annual Report (Form 11-K) for the year ended December 31, 2016.

ARMANINO^{LLP}
San Francisco, California

June 22, 2017