SECURITIES AND EXCHANGE COMMISSION

Washington, D.C. 20549

FORM 6-K

REPORT OF FOREIGN PRIVATE ISSUER PURSUANT TO RULE 13a-16 or 15d-16 OF THE SECURITIES EXCHANGE ACT OF 1934

Report on Form 6-K dated December 11, 2007

STMicroelectronics N.V.

(Name of Registrant)

39, Chemin du Champ-des-Filles 1228 Plan-les-Ouates, Geneva, Switzerland

(Address of Principal Executive Offices)

Indicate by check mark whether the registrant files or will file annual reports under cover of Form 20-F or Form 40-F.

Form 20-F x Form 40-F o

Indicate by check mark if the registrant is submitting the Form 6-K in paper as permitted by Regulation S-T Rule 101(b)(7):

Yes O No X

Indicate by check mark whether the registrant by furnishing the information contained in this form is also thereby furnishing the information to the Commission pursuant to Rule 12g3-2(b) under the Securities Exchange Act of 1934.

Yes O No X

If "Yes" is marked, indicate below the file number assigned to the registrant in connection with

Rule 12g3-2(b): 82-

Enclosure: A press release dated December 11, 2007 announcing that STMicroelectronics entered into a definitive agreement to acquire Genesis Microchip.





STMICROELECTRONICS TO ACQUIRE GENESIS MICROCHIP

Acquisition strengthens STMicroelectronics's position as a semiconductor technology leader in the consumer electronics market

GENEVA, Switzerland and SANTA CLARA, California, December 11, 2007 — STMicroelectronics (NYSE:STM) and Genesis Microchip Inc. (NASDAQ:GNSS) announced today that they have entered into a definitive agreement for STMicroelectronics to acquire Genesis Microchip. The acquisition confirms STMicroelectronics as a leading System-on-Chip (SoC) technology provider to the rapidly growing digital television and display markets.

Under the terms of the agreement, STMicroelectronics will commence a cash tender offer to purchase all of the outstanding shares of Genesis Microchip Inc. for \$8.65 per share, net to the holder in cash, implying a total equity value of approximately \$336 million. Following completion of the tender offer, STMicroelectronics will complete a second-step merger in which any remaining common shares of Genesis Microchip Inc. will be converted into the right to receive the same per share price paid in the tender offer. The offer price represents a premium of 60% to Genesis Microchip's closing share price on Monday, December 10, 2007 and 26% to the average closing share price during the last sixty trading days prior to this announcement. During the twelve months ended September 30, 2007, Genesis reported revenues of \$191 million. As of September 30, 2007, Genesis Microchip's cash and cash equivalents and short-term investments totaled approximately \$183 million. STMicroelectronics will finance the acquisition using existing cash on its balance sheet.

The acquisition has been approved by the Board of Directors of Genesis, which has unanimously recommended that holders of Genesis Microchip's common stock accept the tender offer and approve the second-step merger. The tender offer, which STMicroelectronics expects to commence no later than December 18, 2007, and the second-step merger, are both subject to customary conditions, including receipt of regulatory approvals, and are expected to be completed in the first quarter of 2008.

Through this acquisition, STMicroelectronics expects to expand its leadership in the \$1.5 billion digital TV market, one of the fastest growing segments in consumer semiconductors. Genesis Microchip will enhance STMicroelectronics's technological capabilities for the transition to fully digital solutions in this segment and strengthen its product and intellectual-property portfolio.

"STMicroelectronics is a leader in digital consumer technologies, with a strong position in set-top box compression and decompression technologies and "front end" processing technologies in digital TV. Genesis is a leader in "back-end" image and video processing and digital interconnect technologies," said Philippe Lambinet, Corporate Vice President and General Manager of STMicroelectronics's Home Entertainment & Displays Group. "The combined company will have the products, technology, IP and expertise to offer best-in-class integrated DTV processing solutions that our customers are increasingly demanding. We also believe that the Genesis DisplayPort technology brings expanded opportunities to the PC and home entertainment markets."

"This combination represents an exciting opportunity for Genesis," said Elias Antoun, Genesis Microchip's President and Chief Executive Officer. "Joining forces with STMicroelectronics will put us in the best position to ensure that our products and technologies remain at the forefront of our industry. Our innovative technology, when combined with STMicroelectronics's resources, silicon design expertise and manufacturing capabilities can accelerate the delivery of the next generation of solutions for our digital television, flat-panel display and DisplayPort customer base."

On closing, Genesis will become part of STMicroelectronics's Home Entertainment & Displays Group. Elias Antoun will join STMicroelectronics and will lead STMicroelectronics's television and display initiatives, reporting to Philippe Lambinet.

Morgan Stanley acted as exclusive financial advisor to STMicroelectronics and Shearman & Sterling LLP acted as legal counsel. Goldman Sachs acted as exclusive financial advisor to Genesis Microchip and Wilson Sonsini Goodrich & Rosati Professional Corporation acted as legal counsel.

Conference Call

A conference call open to all interested parties regarding STMicroelectronics's acquisition of Genesis will take place on December 11, 2007, at 9 a.m. EST / 3 p.m. CET. To listen to the conference call via telephone, please call +1 877 317 6799 (US) or +44 (0) 20 7107 0611 (International). To listen via the Internet, please visit http://investors.st.com. Playback of the conference call will be available through December 21, 2007.

About STMicroelectronics

STMicroelectronics is a global leader in developing and delivering semiconductor solutions across the spectrum of microelectronics applications. An unrivalled combination of silicon and system expertise, manufacturing strength, Intellectual Property (IP) portfolio and strategic partners positions STMicroelectronics at the forefront of System-on-Chip (SoC) technology and its products play a key role in enabling today's convergence markets. STMicroelectronics's shares are traded on the New York Stock Exchange, on Euronext Paris and on the Milan Stock Exchange. In 2006, the Company's net revenues were \$9.85 billion and net earnings were \$782 million. Further information on STMicroelectronics can be found at www.st.com.

About Genesis

Genesis Microchip Inc. is a leading provider of image and video processing systems enabling superior picture quality in flat-panel TVs and a variety of consumer and PC-display products. Featuring Genesis Display Perfection(R) technologies and Emmy award-winning Faroudja(R) video technologies, Genesis system-on-a-chip solutions are used worldwide by display manufacturers to produce visibly better images across a broad array of devices including flat-panel displays, digital TVs, projectors, A/V receivers and DVD players/recorders. Genesis is also the primary driver of the DisplayPort digital interface standard which enables a common, royalty free, scalable interface between any flat panel display and video or data source. In addition to DisplayPort technology, the Genesis technology portfolio features analog and mixed signal system-on-a-chip design, DCDi(R) by Faroudja deinterlacing, TrueLife(TM) video enhancement, IntelliComb(TM) video decoding and includes over 210 patents. Founded in 1987, Genesis supports its leading brand-name customers with offices in the U.S., Canada, India, Taiwan, South Korea, China, Japan and Singapore, including LG, Toshiba and Samsung. For more information about Genesis Microchip Inc. or Genesis Display Perfection technologies, please visit www.gnss.com.

IMPORTANT INFORMATION

The tender offer described herein has not commenced. This announcement and the description contained herein are provided for informational purposes only and are neither an offer to purchase nor a solicitation of an offer to sell any securities of Genesis Microchip Inc. Any offers to purchase or solicitations of offers to sell will be made only pursuant to the Tender Offer Statement on Schedule TO (including the offer to purchase, the letter of transmittal and other documents relating to the tender offer) which will be filed with the U.S. Securities and Exchange Commission ("SEC") by Sophia Acquisition Corp., a wholly owned subsidiary of STMicroelectronics. In addition, Genesis Microchip Inc. will file with the SEC a Solicitation/Recommendation Statement on Schedule 14D-9 with respect to the Tender Offer. Genesis Microchip's shareholders are advised to read these documents and any other documents relating to the tender offer that are filed with the SEC carefully and in their entirety because they contain important information.

Genesis Microchip Inc.'s shareholders may obtain copies of these documents (when they become available) for free at the SEC's website at www.sec.gov or from STMicroelectronics Investor Relations Department, 780 Third Ave, 9th Floor, New York, NY 10017.

Cautionary statement regarding forward-looking statements

Some of the statements contained in this release that are not historical facts are statements of future expectations and other forward-looking statements (within the meaning of Section 27A of the Securities Act of 1933 or Section 21E of the Securities Exchange Act of 1934, each as amended) based on STMicroelectronics's management's current views and assumptions and involve known and unknown risks and uncertainties that could cause actual results, performance or events to differ materially from those in such statements due to, among other factors:

- future developments of the world semiconductor market, in particular the future demand for semiconductor products in the key application markets and from key customers served by STMicroelectronics's products;
- · pricing pressures, losses or curtailments of purchases from key customers all of which are highly variable and difficult to predict;
- · the financial impact of obsolete or excess inventories if actual demand differs from STMicroelectronics's anticipations;
- the impact of intellectual property claims by STMicroelectronics's competitors or other third parties, and STMicroelectronics's ability to obtain required licenses on reasonable terms and conditions;
- changes in the exchange rates between the US dollar and the Euro and between the U.S. dollar and the currencies of the other major countries in which STMicroelectronics has operating infrastructure;
- STMicroelectronics's ability to manage in an intensely competitive and cyclical industry, where a high percentage of its costs are fixed and difficult to reduce in the short term, including its ability to adequately utilize and operate its manufacturing facilities at sufficient levels to cover fixed operating costs;
- STMicroelectronics's ability to close, as currently planned and scheduled, its agreement with Intel and Francisco Partners concerning the creation of a new independent Flash memory company to be named "Numonyx" if the financial, business or other conditions to Closing as contractually provided are not met; and the estimated loss of \$857 million posted so far, in relation to its Flash memory business, may materially change at Closing as a result of developments in the Flash memory business;
- STMicroelectronics's ability in an intensively competitive environment, to secure customer acceptance and to achieve its pricing expectations for high-volume supplies of new products in whose development STMicroelectronics has been, or is currently, investing;
- the attainment of anticipated benefits of research and development alliances and cooperative activities, as well as the uncertainties concerning the modalities, conditions and financial impact beyond 2007 of future R&D activities in Crolles2;
- the ability of STMicroelectronics's suppliers to meet its demands for supplies and materials and to offer competitive pricing;
- significant differences in the gross margins STMicroelectronics achieves compared to expectations, based on changes in revenue levels, product mix and pricing, capacity utilization, variations in inventory valuation, excess or obsolete inventory, manufacturing yields, changes in unit costs, impairments of long-lived assets (including manufacturing, assembly/test and intangible assets) and the timing and execution of STMicroelectronics's manufacturing investment plans and associated costs, including start-up costs;
- changes in the economic, social or political environment, including military conflict and/or terrorist activities, as well as natural events such as severe weather, health risks, epidemics or earthquakes in the countries in which STMicroelectronics, its key customers and its suppliers, operate;
- changes in STMicroelectronics's overall tax position as a result of changes in tax laws or the outcome of tax audits, and its ability to accurately estimate tax credits, benefits, deductions and provisions and to realize deferred tax assets;
- the outcome of litigation;
- the results of actions by STMicroelectronics's competitors, including new product offerings and its ability to react thereto.
- the timing and completion of an all cash tender offer for the outstanding shares of Genesis,
- the ability to complete the tender offer and subsequent merger on the terms contemplated, and
- the anticipated impact of the acquisition on STMicroelectronics's operations and financial results.

Such forward-looking statements are subject to various risks and uncertainties, which may cause actual results and performance of STMicroelectronics's business to differ materially and adversely from the forward-looking statements. Certain such forward-looking statements can be identified by the use of forward-looking terminology such as "believes", "may", "will", "should", "would be" or "anticipates" or similar expressions or the negative thereof or other variations thereof, or by discussions of strategy, plans

or intentions. Some of the risk factors STMicroelectronics faces are set forth and are discussed in more detail in "Item 3. Key Information—Risk Factors" included in STMicroelectronics's Annual Report on Form 20-F for the year ended December 31, 2006, as filed with the SEC on March 14, 2007. Should one or more of these risks or uncertainties materialize, or should underlying assumptions prove incorrect, actual results may vary materially from those described in this release as anticipated, believed or expected. STMicroelectronics does not intend, and does not assume any obligation, to update any information or forward-looking statements set forth in this release to reflect subsequent events or circumstances.

Unfavorable changes in the above or other factors listed under "Risk Factors" from time to time in STMicroelectronics's SEC filings, including its Form 20-F, could have a material adverse effect on STMicroelectronics's results of operations or financial condition.

For further information please contact:

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SIGNATURES

Pursuant to the requirements of the Securities Exchange Act of 1934, STMicroelectronics N.V. has duly caused this report to be signed on its behalf by the undersigned, thereunto duly authorized.

STMicroelectronics N.V.

Date: December 11, 2007 By: /s/ CARLO FERRO

Name: Carlo Ferro

Title: Executive Vice President and

Chief Financial Officer