

# Intraday Contagion Effects among the U.S. Internet Stocks

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## Abstract

This study employs the aggregate shock model to examine the intraday return transmissions among the U.S. technology stocks. Our multilateral analysis reveals the following. First, we find significantly positive return transmission effects, suggesting that industry common effects dominate competition effects at high frequencies for technology stocks. Second, we observe asymmetric contagion effects in relation to firm size in that the information of a larger stock asserts greater influence over other stocks, that larger stocks are more responsive toward a given innovation perhaps due to their greater information efficiency, and that mutual return transmissions are directionally asymmetric in that the information of the larger stock is more contagious over the smaller stock than vice versa. Third, a further examination by controlling for the market-wide impact and the observation of directional asymmetry indicate that the linkage among technology stocks is partly attributed to pure contagions in addition to responses to common factors. This paper does not find significant volume effects in relation to the information transmission, suggesting that volume is a noisy measure of information as trade occurs due to information arrivals as well as investors' difference of opinions.

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